

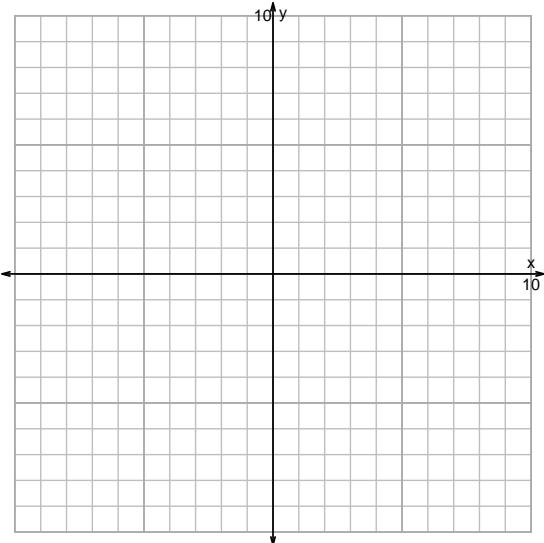
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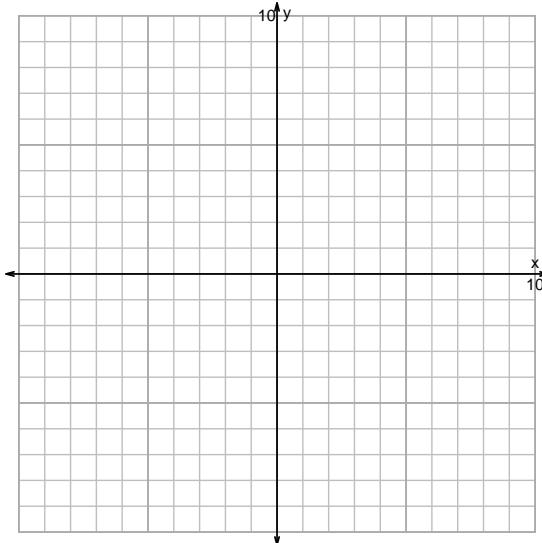
s18QUIZ: EXP LOG (PRACTICE v100)

1. Graph $y = \log_2(x - 5) + 3$ and $y = 2^{x-4} + 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 5) + 3$$



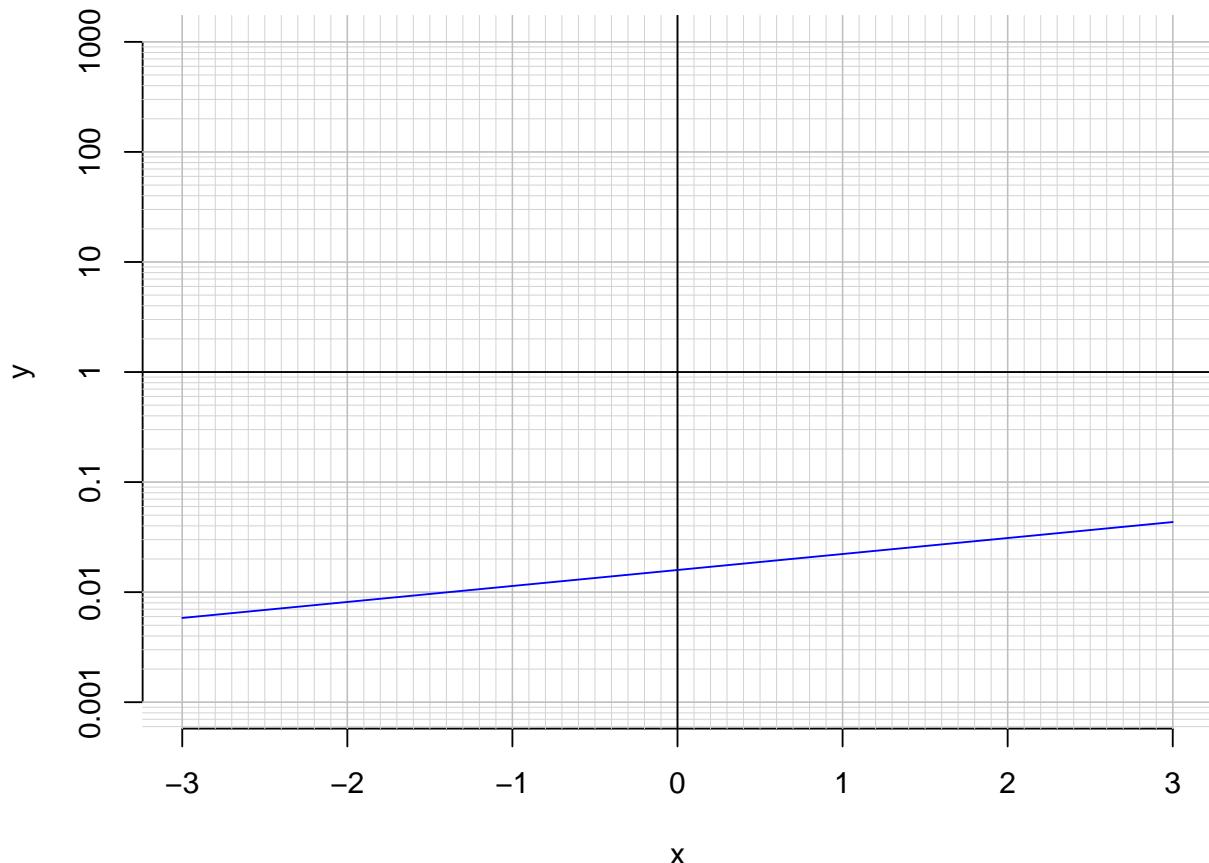
$$y = 2^{x-4} + 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$17 = \left(\frac{4}{7}\right) \cdot 10^{5t/3}$$

3. An exponential function $f(x) = 0.0159 \cdot e^{0.334x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.7)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.03)$.

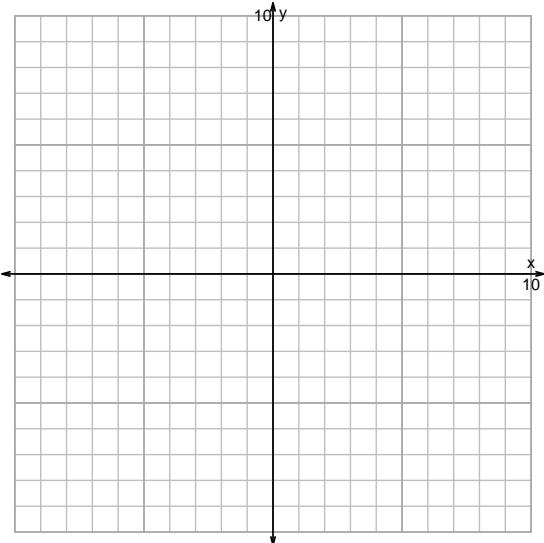
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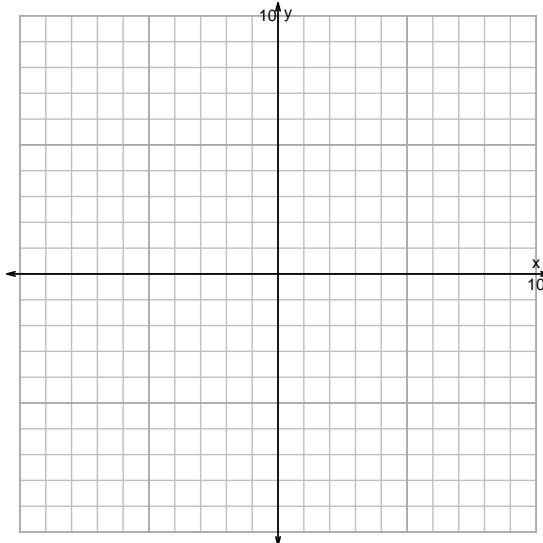
s18QUIZ: EXP LOG (PRACTICE v101)

1. Graph $y = 2^{x-3} - 6$ and $y = \log_2(x - 5) - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-3} - 6$$



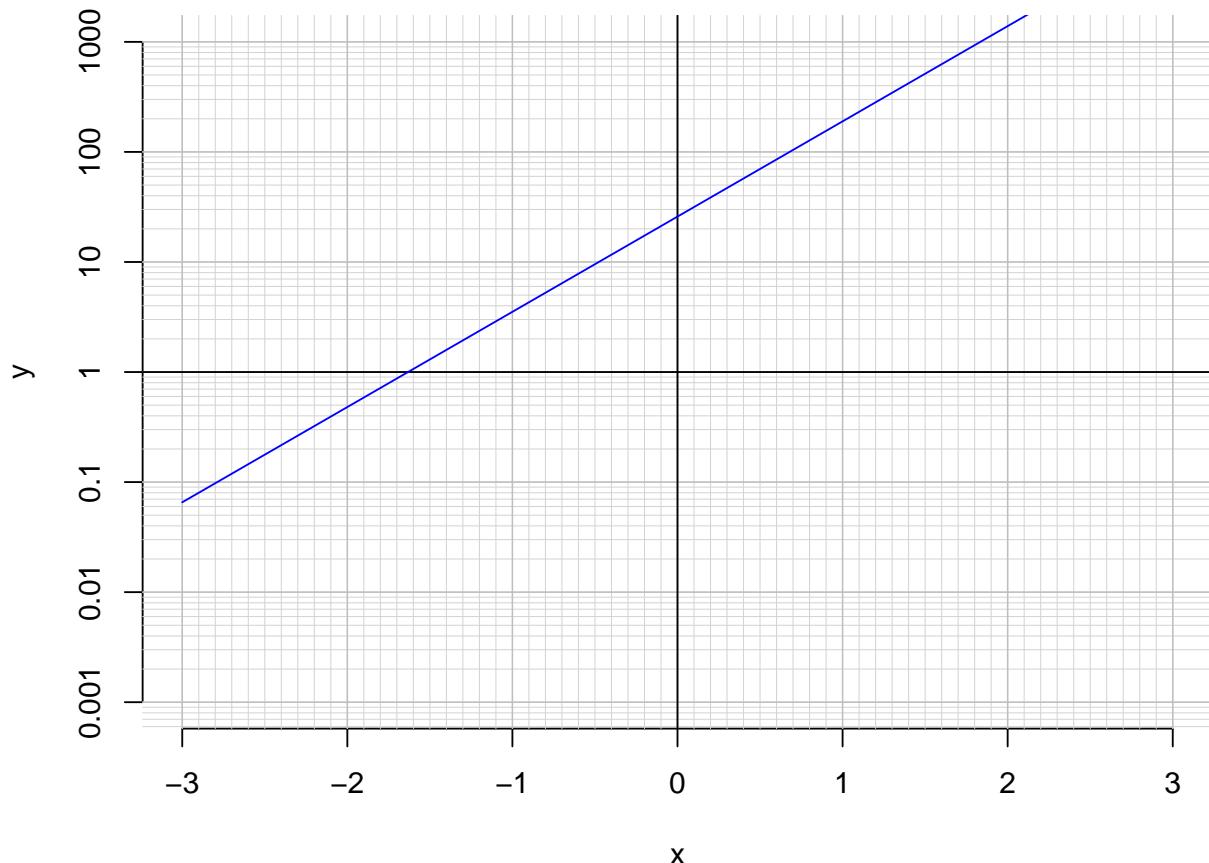
$$y = \log_2(x - 5) - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$17 = \left(\frac{4}{5}\right) \cdot 2^{-7t/3}$$

3. An exponential function $f(x) = 25.8 \cdot e^{1.99x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-2.9)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(70)$.

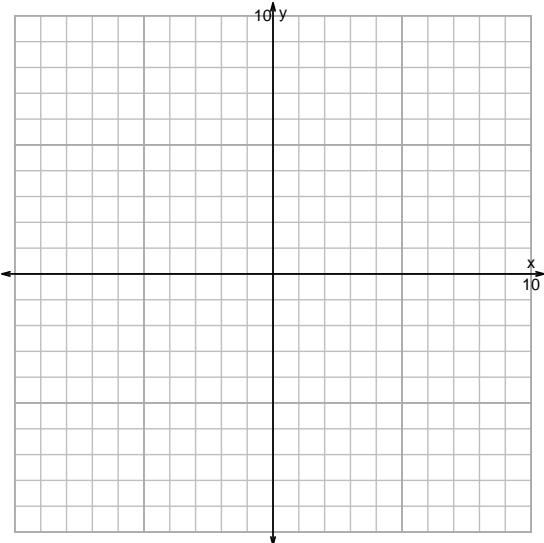
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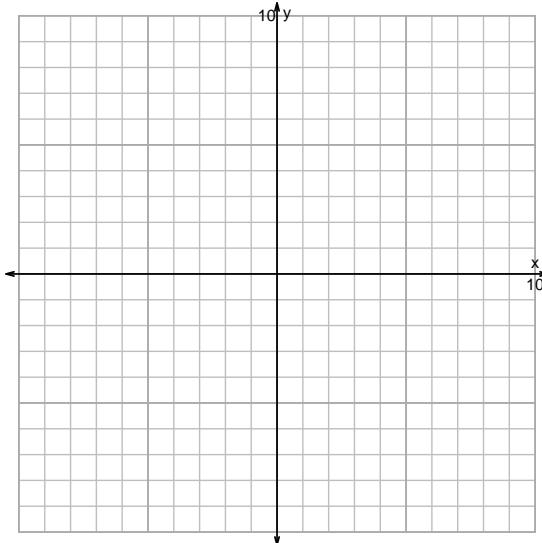
s18QUIZ: EXP LOG (PRACTICE v102)

1. Graph $y = \log_2(x + 6) + 5$ and $y = 2^{x+5} + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 6) + 5$$



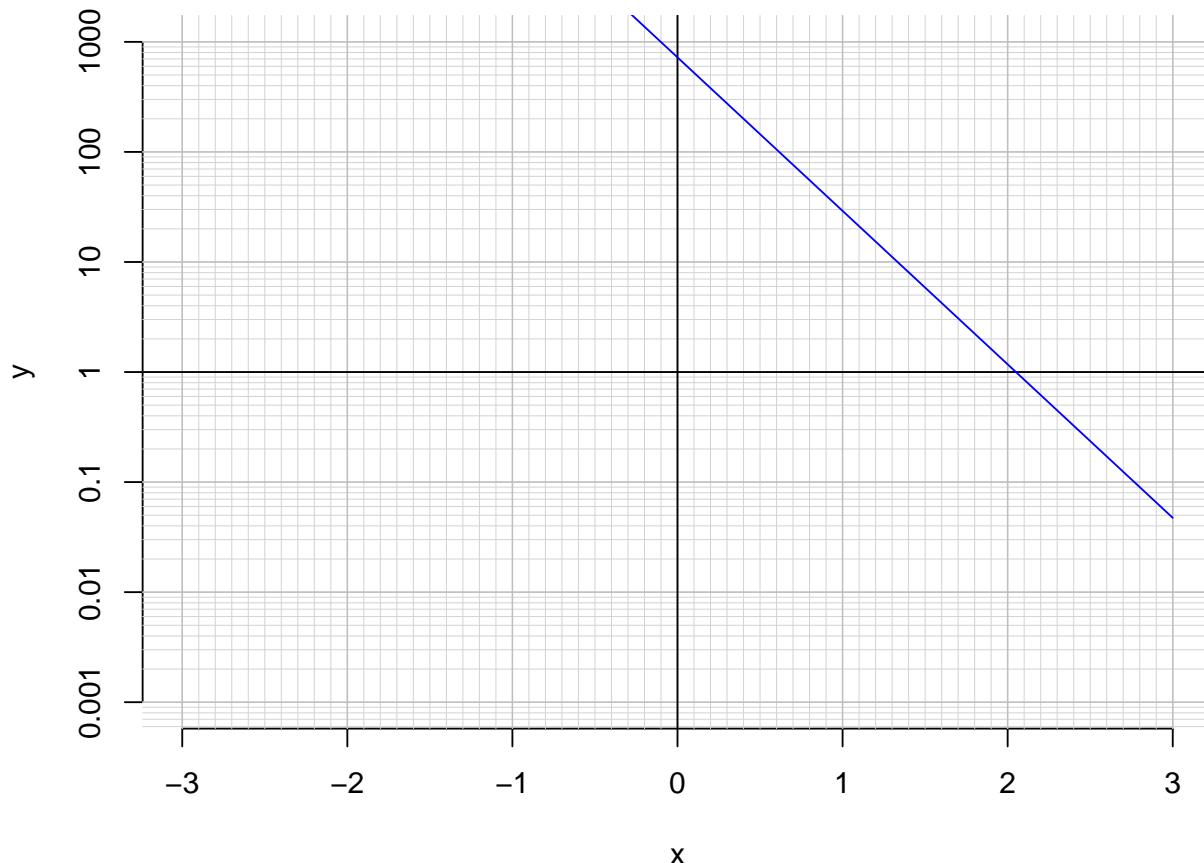
$$y = 2^{x+5} + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-23 = \left(\frac{-5}{7}\right) \cdot 2^{3t/4}$$

3. An exponential function $f(x) = 722 \cdot e^{-3.21x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(0.4)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.09)$.

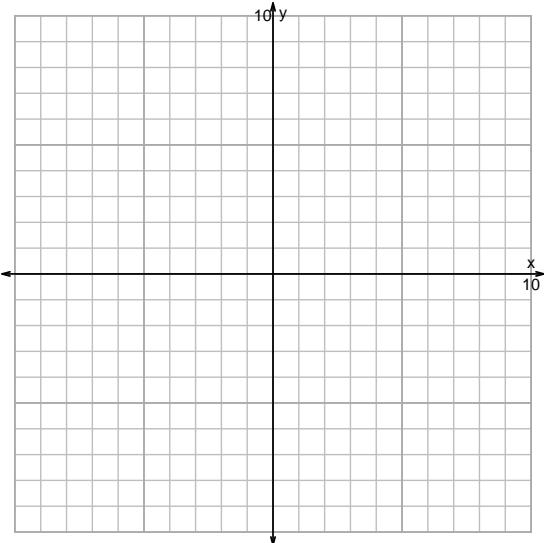
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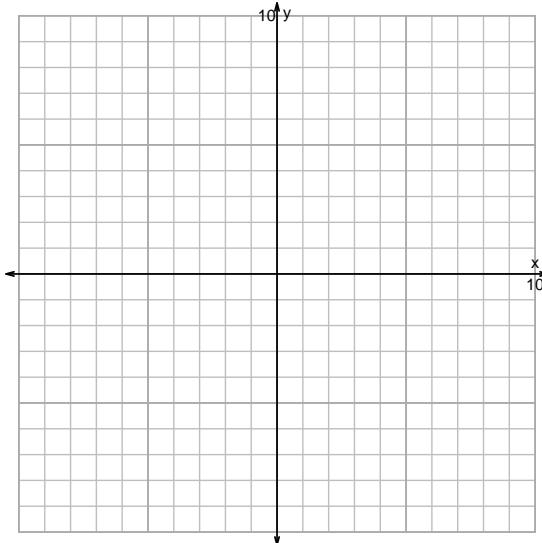
s18QUIZ: EXP LOG (PRACTICE v103)

1. Graph $y = 2^{x-6} - 5$ and $y = \log_2(x-6) + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-6} - 5$$



$$y = \log_2(x-6) + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$23 = \left(\frac{7}{4}\right) \cdot 2^{3t/5}$$

3. An exponential function $f(x) = 0.0585 \cdot e^{2.73x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.9)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(8)$.

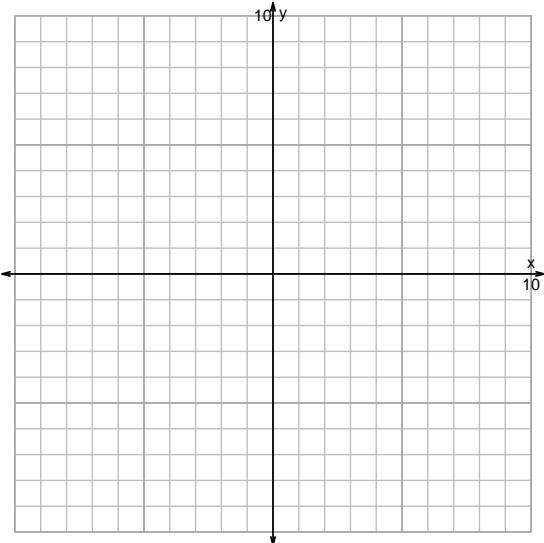
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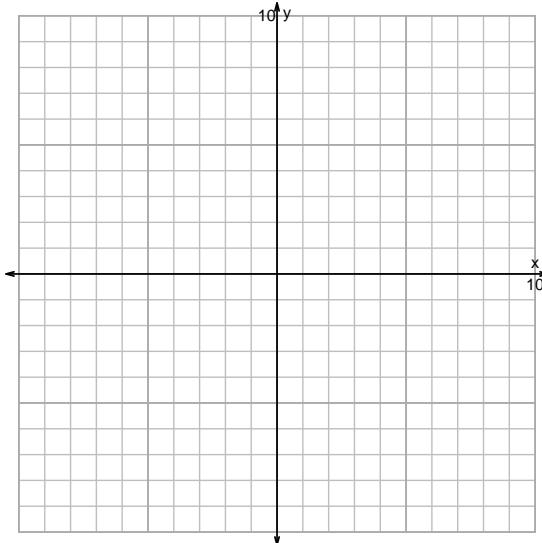
s18QUIZ: EXP LOG (PRACTICE v104)

1. Graph $y = \log_2(x - 4) - 6$ and $y = 2^{x-3} + 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 4) - 6$$



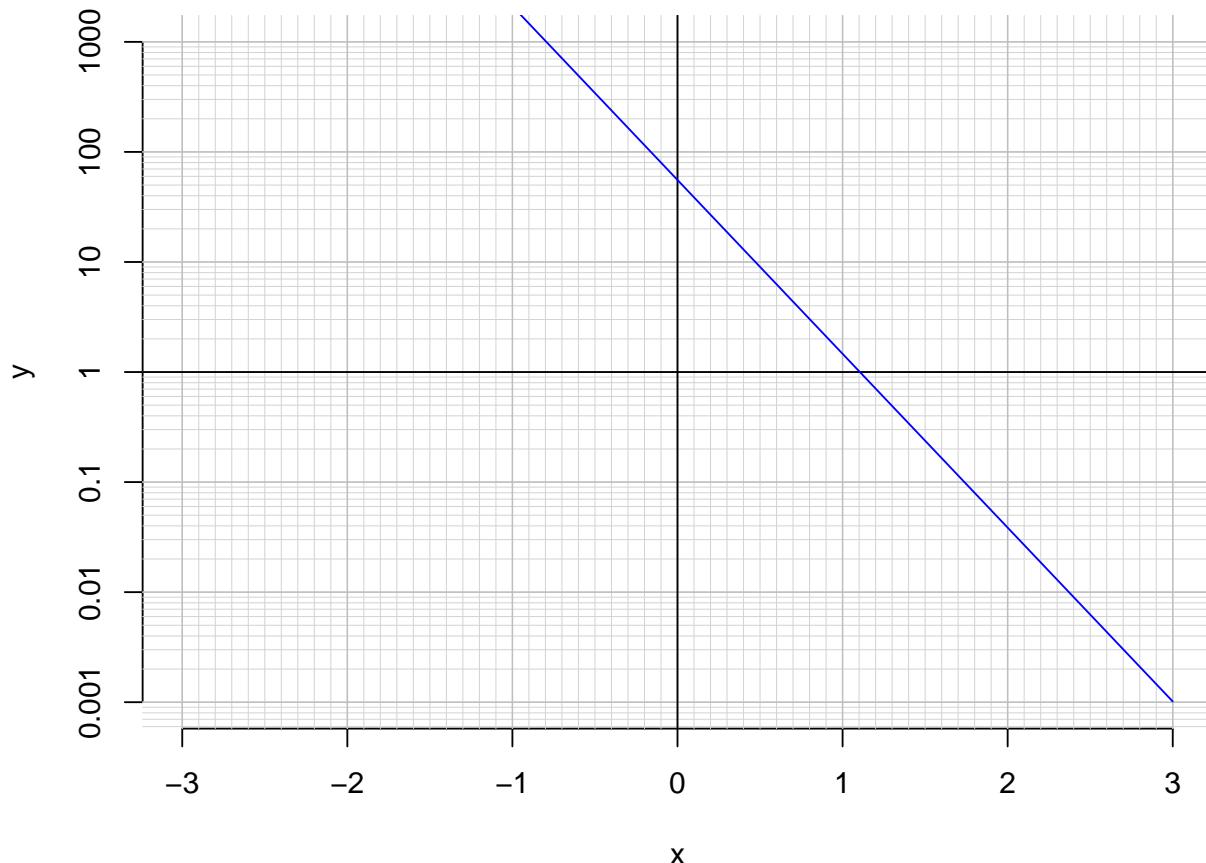
$$y = 2^{x-3} + 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-19 = \left(\frac{-4}{7}\right) \cdot 2^{-3t/5}$$

3. An exponential function $f(x) = 55.6 \cdot e^{-3.64x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.4)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(80)$.

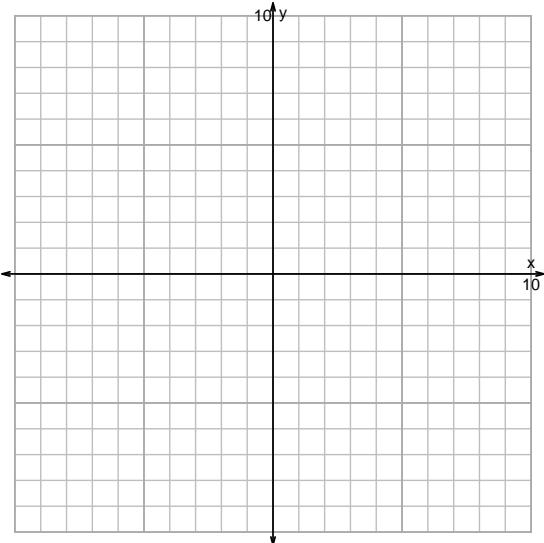
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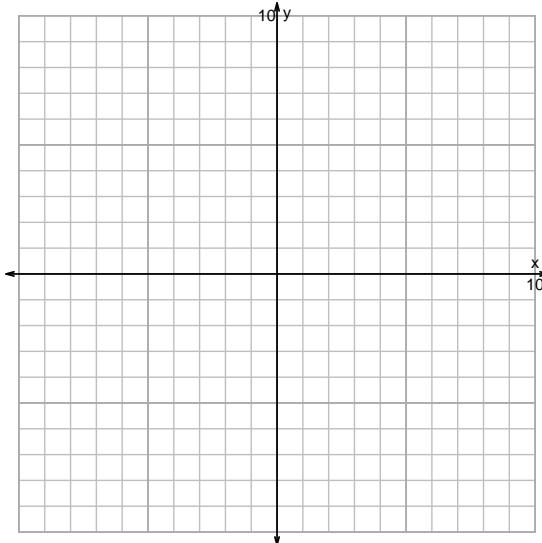
s18QUIZ: EXP LOG (PRACTICE v105)

1. Graph $y = \log_2(x - 3) + 5$ and $y = 2^{x-3} + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 3) + 5$$



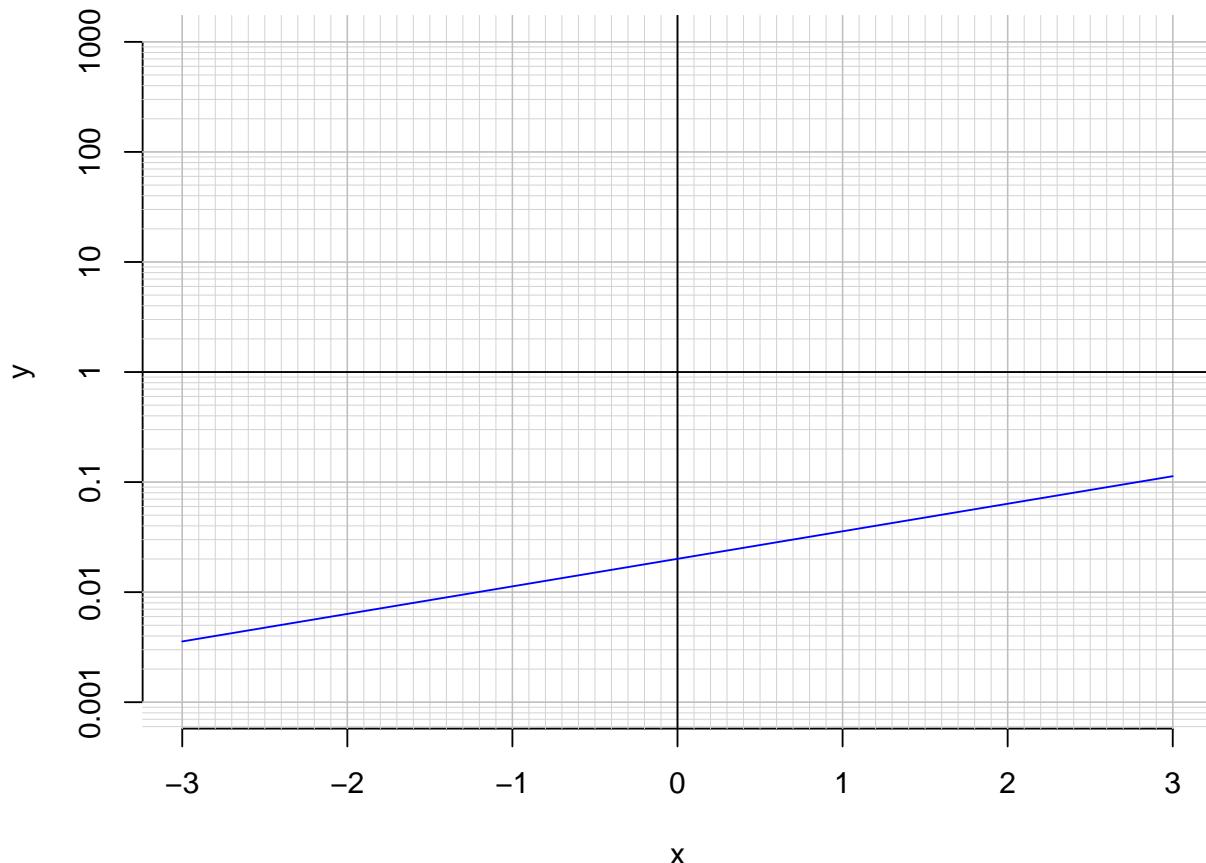
$$y = 2^{x-3} + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-29 = \left(\frac{-4}{5}\right) \cdot 2^{7t/3}$$

3. An exponential function $f(x) = 0.0201 \cdot e^{0.576x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.9)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.004)$.

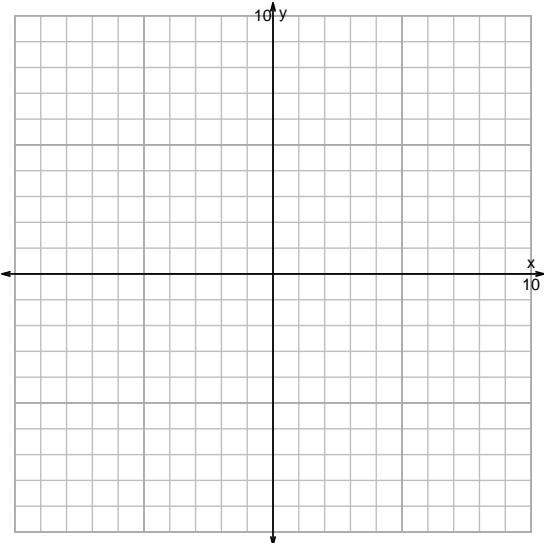
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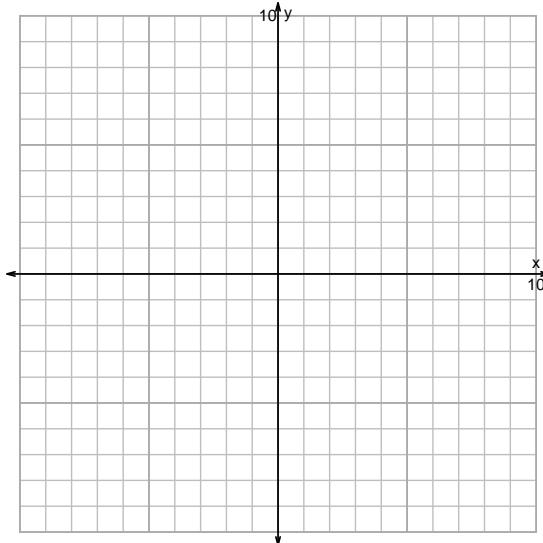
s18QUIZ: EXP LOG (PRACTICE v106)

1. Graph $y = 2^{x-3} + 4$ and $y = \log_2(x - 4) + 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-3} + 4$$



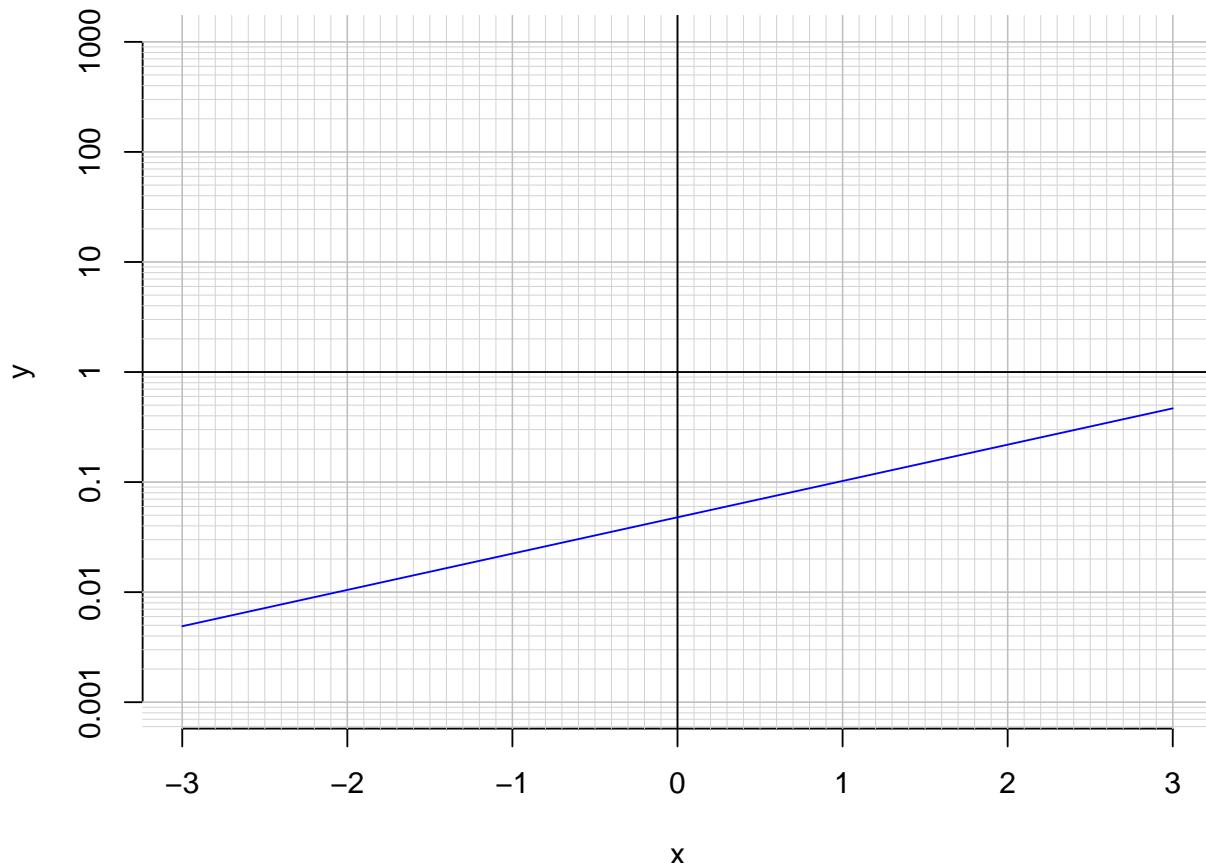
$$y = \log_2(x - 4) + 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$17 = \left(\frac{3}{4}\right) \cdot 2^{-7t/5}$$

3. An exponential function $f(x) = 0.0479 \cdot e^{0.76x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-2.2)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.07)$.

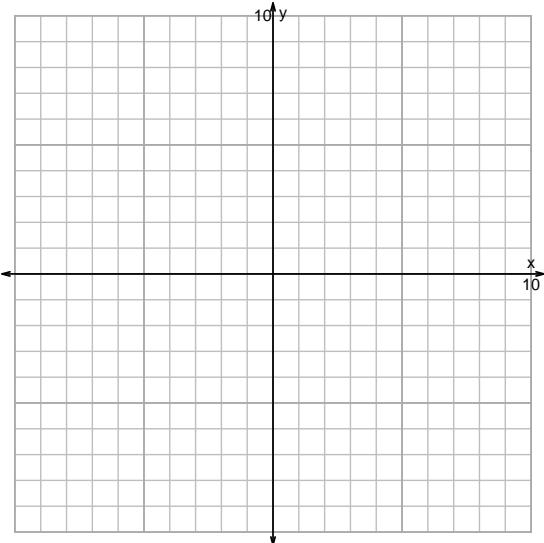
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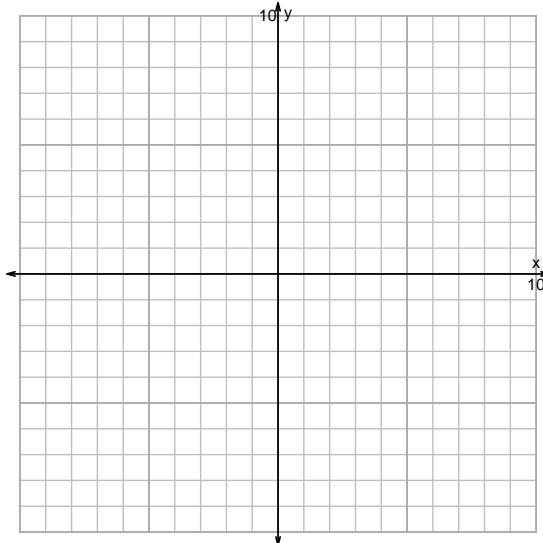
s18QUIZ: EXP LOG (PRACTICE v107)

1. Graph $y = 2^{x-6} + 5$ and $y = \log_2(x - 5) - 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-6} + 5$$



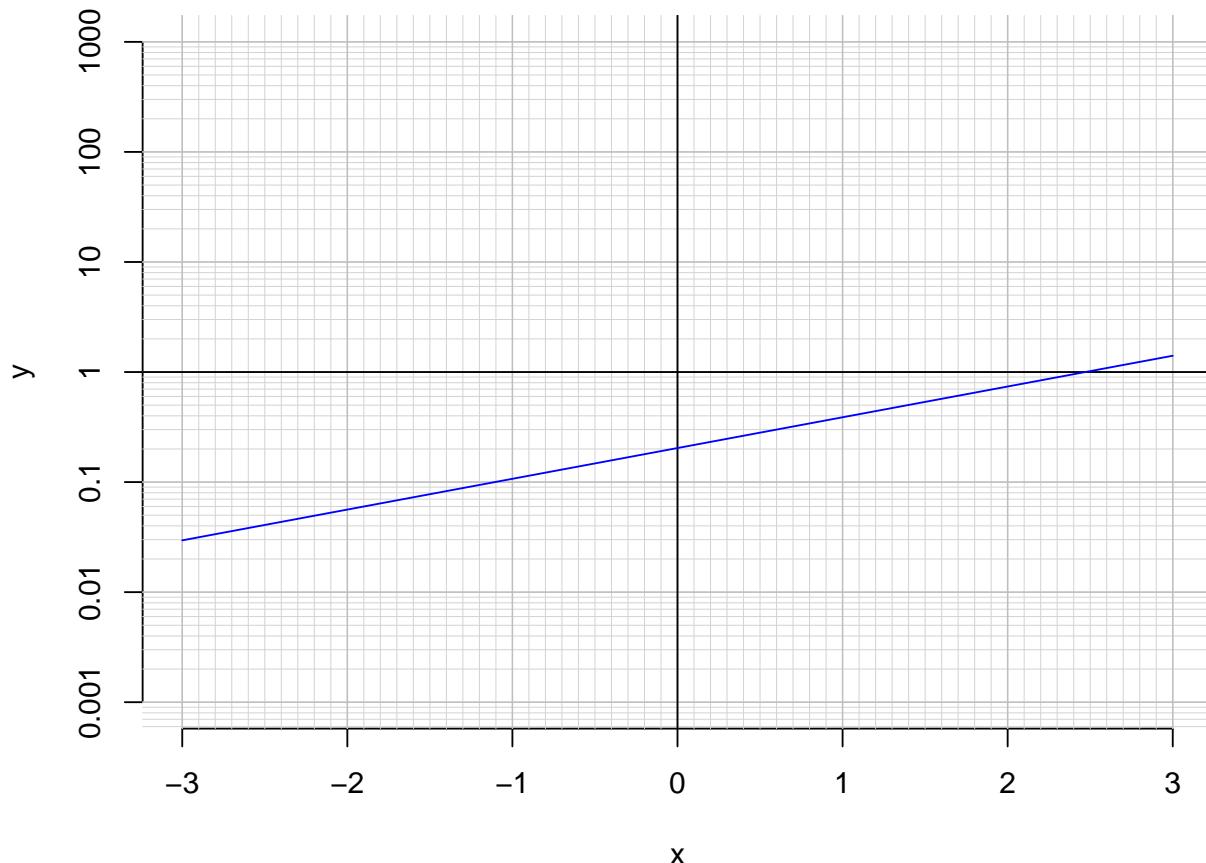
$$y = \log_2(x - 5) - 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-19 = \left(\frac{-4}{7}\right) \cdot 2^{-5t/3}$$

3. An exponential function $f(x) = 0.204 \cdot e^{0.644x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.9)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.3)$.

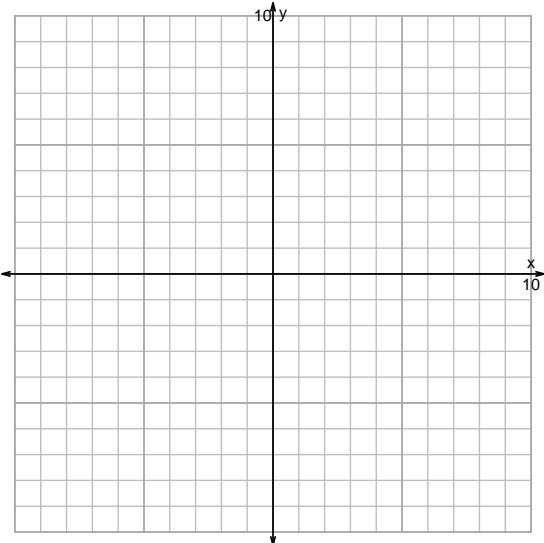
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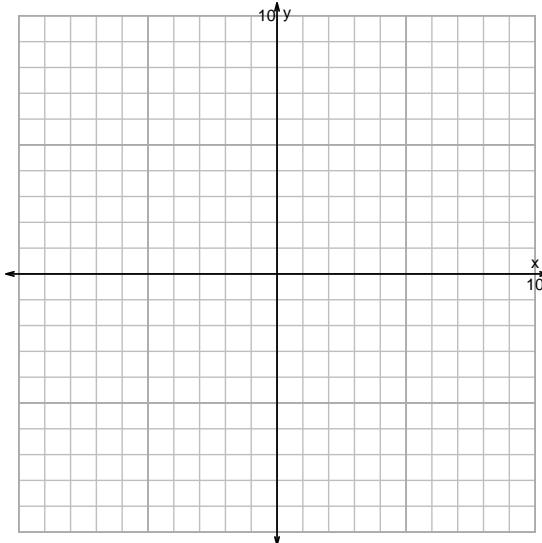
s18QUIZ: EXP LOG (PRACTICE v108)

1. Graph $y = \log_2(x + 5) - 3$ and $y = 2^{x+5} + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 5) - 3$$



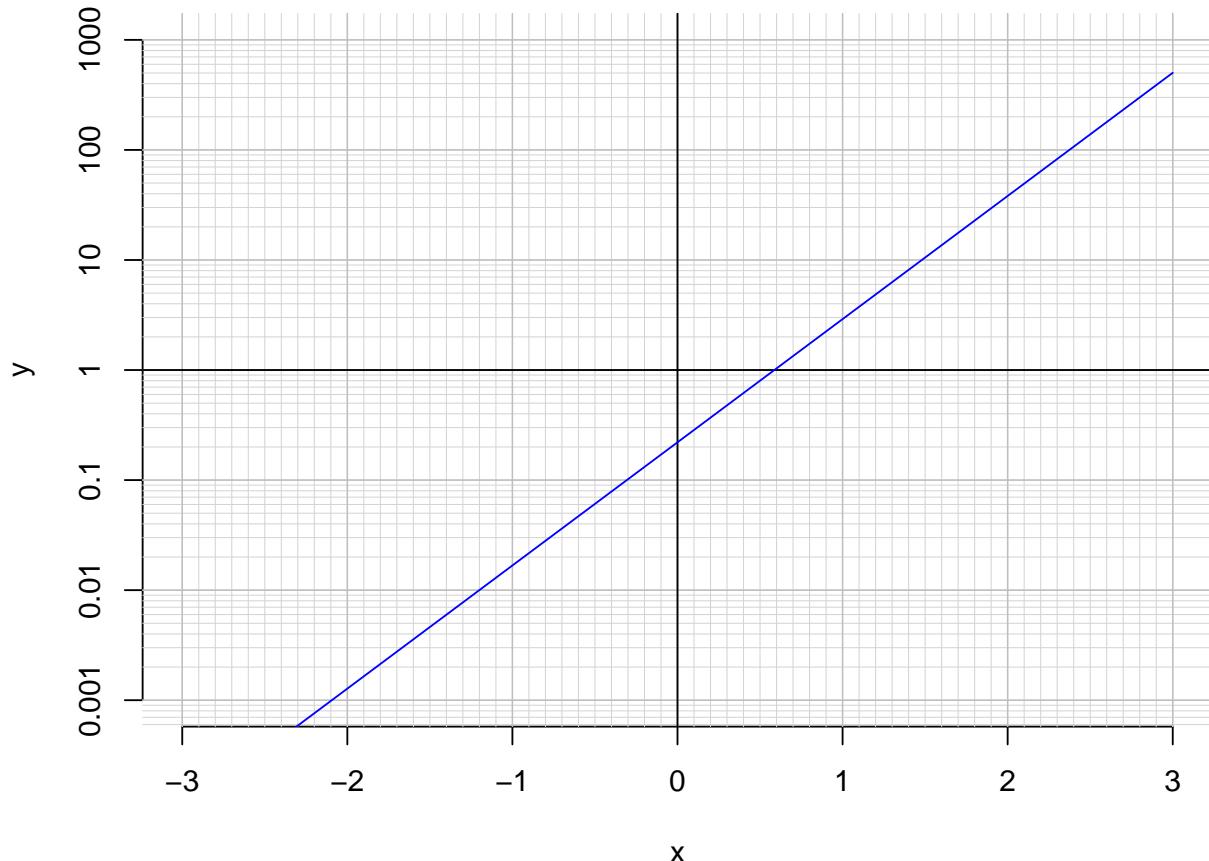
$$y = 2^{x+5} + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$11 = \left(\frac{3}{7}\right) \cdot 2^{5t/4}$$

3. An exponential function $f(x) = 0.221 \cdot e^{2.58x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.8)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.8)$.

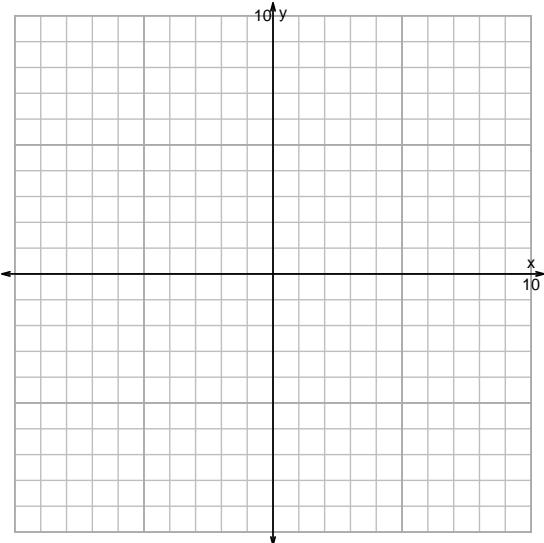
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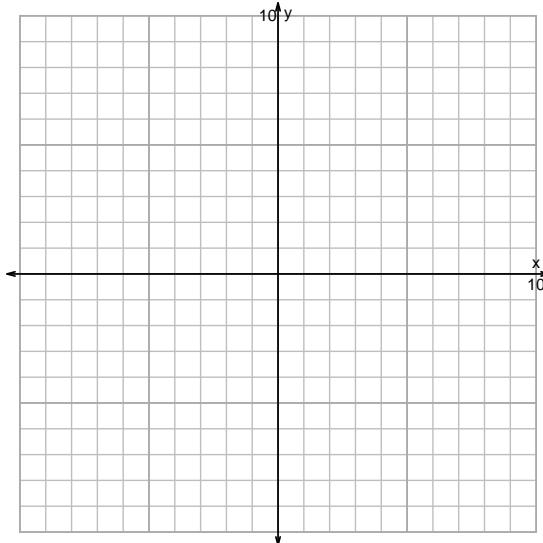
s18QUIZ: EXP LOG (PRACTICE v109)

1. Graph $y = 2^{x-3} + 4$ and $y = \log_2(x - 3) + 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-3} + 4$$



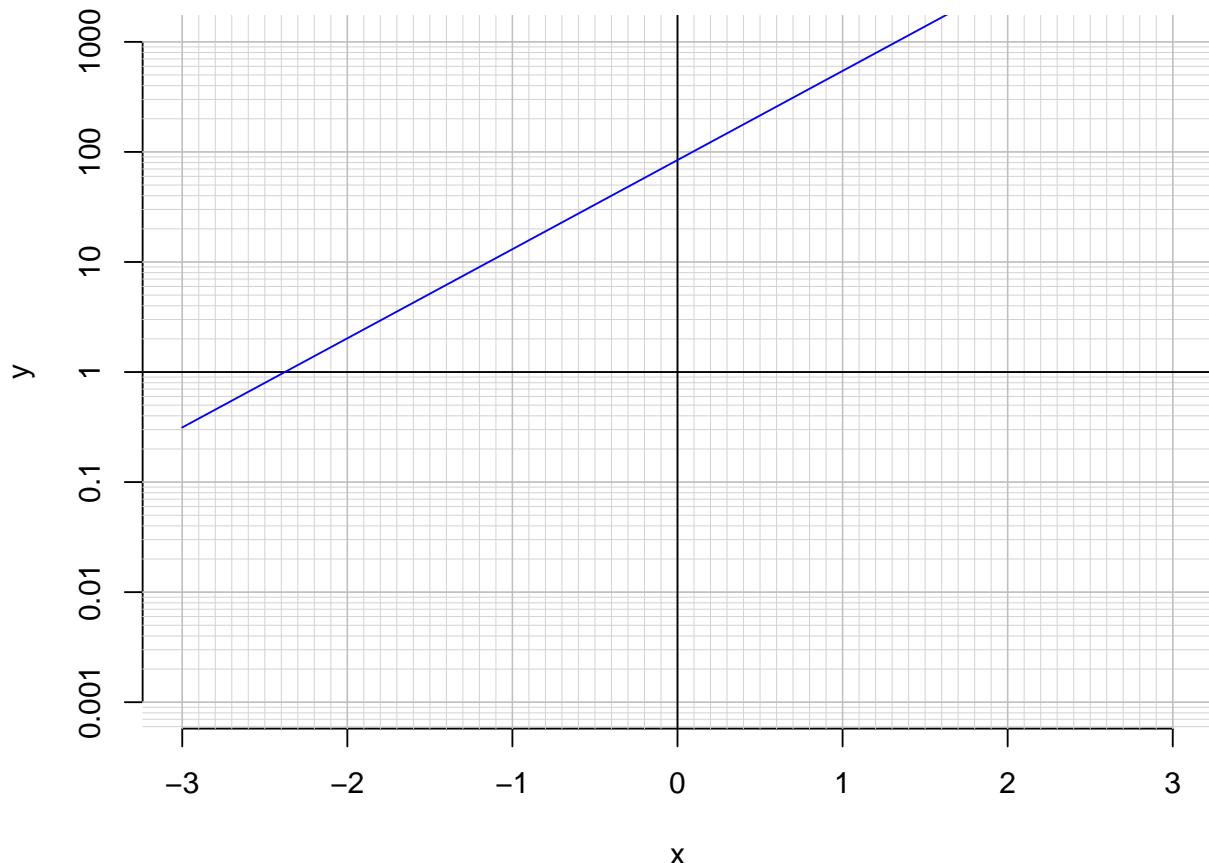
$$y = \log_2(x - 3) + 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$29 = \left(\frac{7}{4}\right) \cdot 2^{-3t/5}$$

3. An exponential function $f(x) = 84.3 \cdot e^{1.86x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.1)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(9)$.

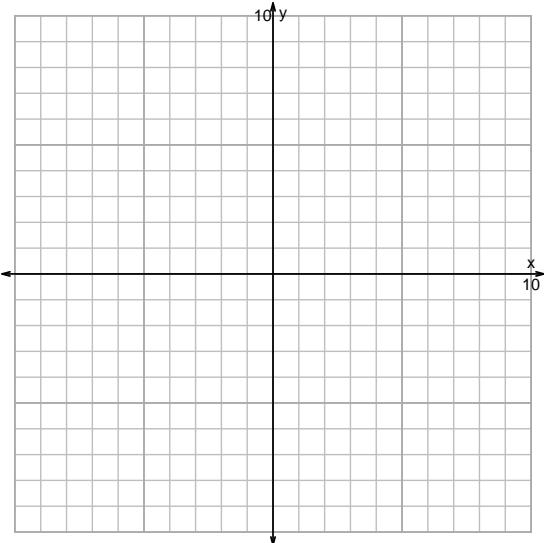
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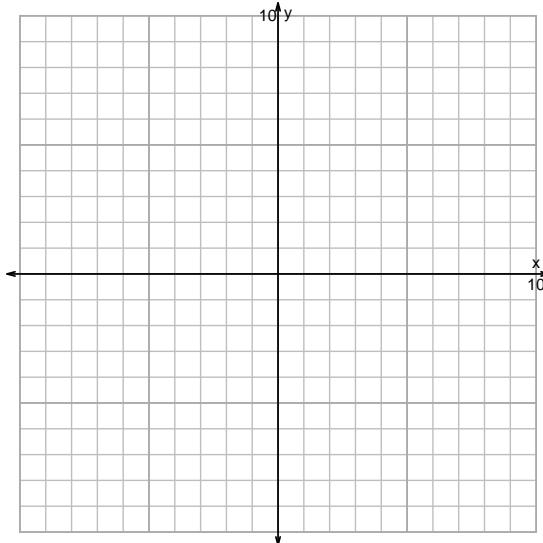
s18QUIZ: EXP LOG (PRACTICE v110)

1. Graph $y = 2^{x+6} - 4$ and $y = \log_2(x + 6) - 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+6} - 4$$



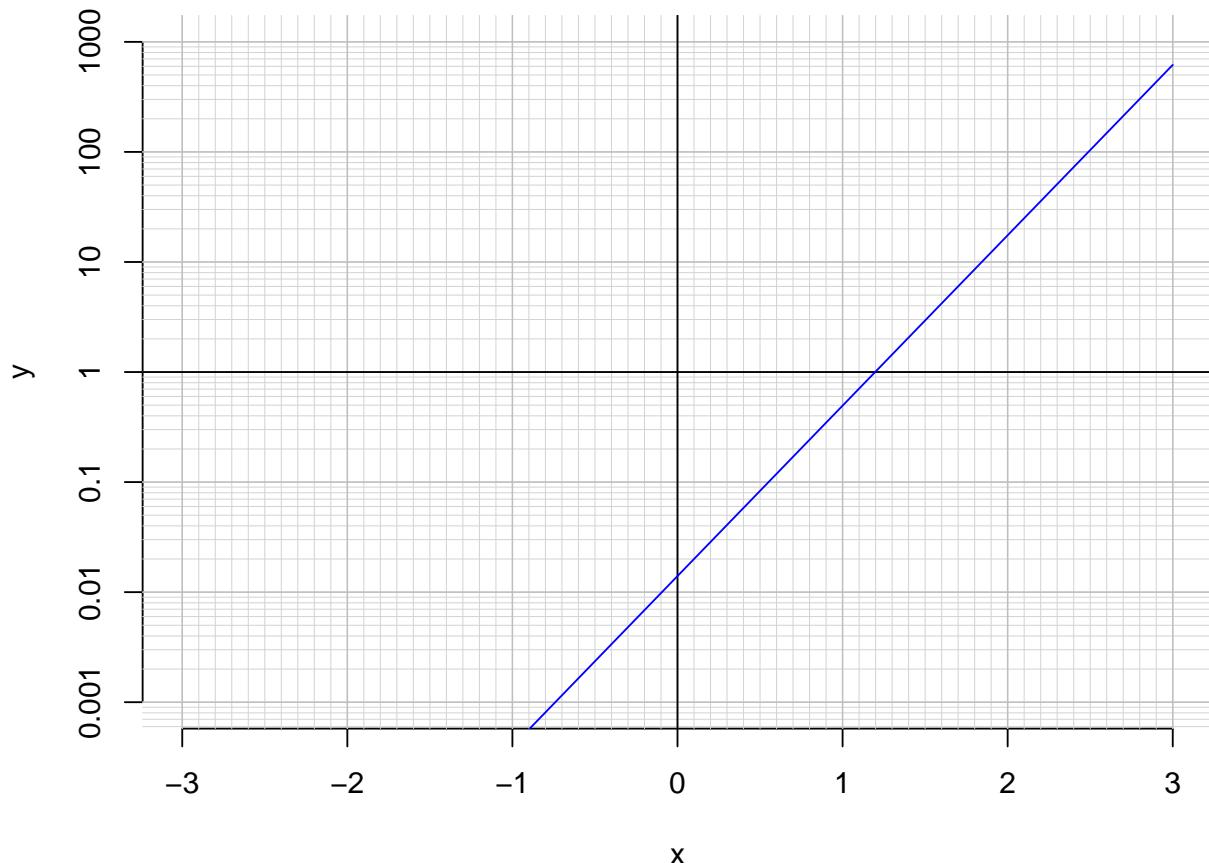
$$y = \log_2(x + 6) - 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$11 = \left(\frac{5}{7}\right) \cdot 2^{-4t/3}$$

3. An exponential function $f(x) = 0.014 \cdot e^{3.56x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.7)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.02)$.

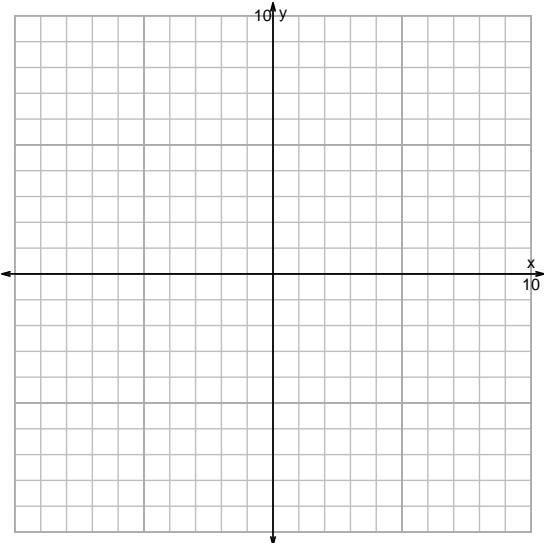
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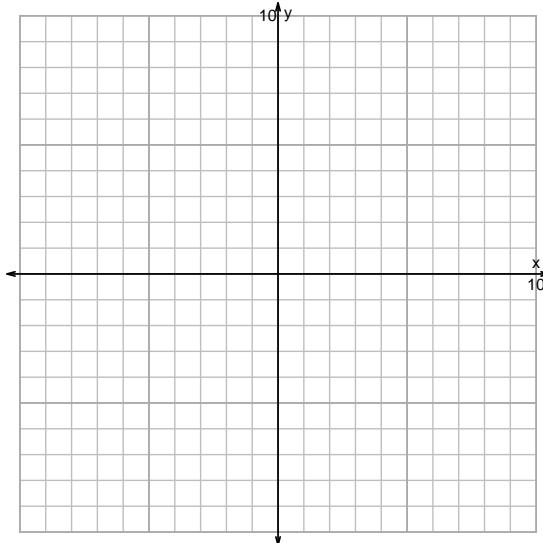
s18QUIZ: EXP LOG (PRACTICE v111)

1. Graph $y = 2^{x-4} - 5$ and $y = \log_2(x + 5) - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-4} - 5$$



$$y = \log_2(x + 5) - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$29 = \left(\frac{4}{3}\right) \cdot 10^{5t/7}$$

3. An exponential function $f(x) = 0.0753 \cdot e^{-2.07x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.2)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(20)$.

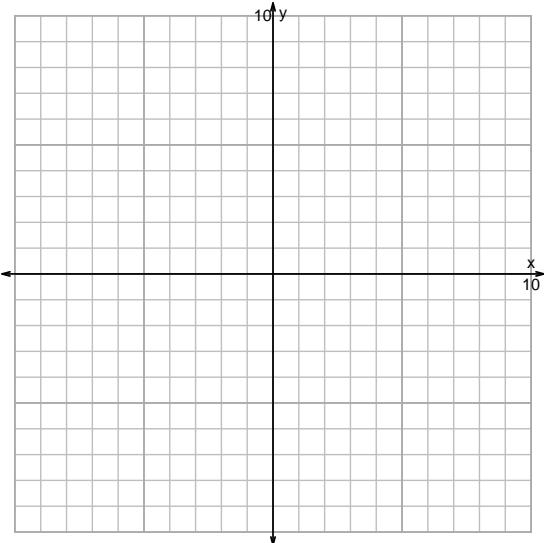
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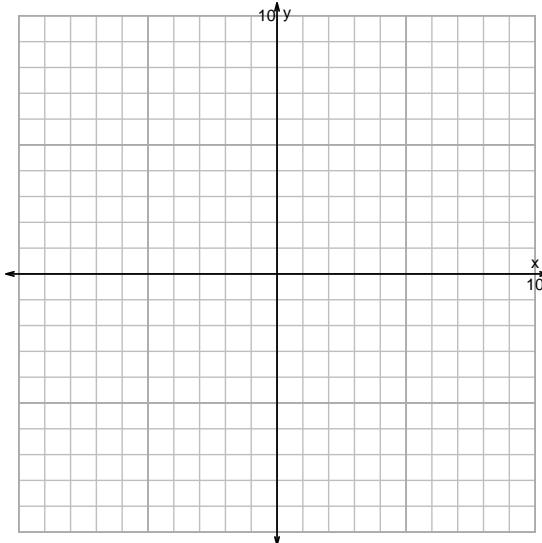
s18QUIZ: EXP LOG (PRACTICE v112)

1. Graph $y = \log_2(x - 4) + 3$ and $y = 2^{x-4} - 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 4) + 3$$



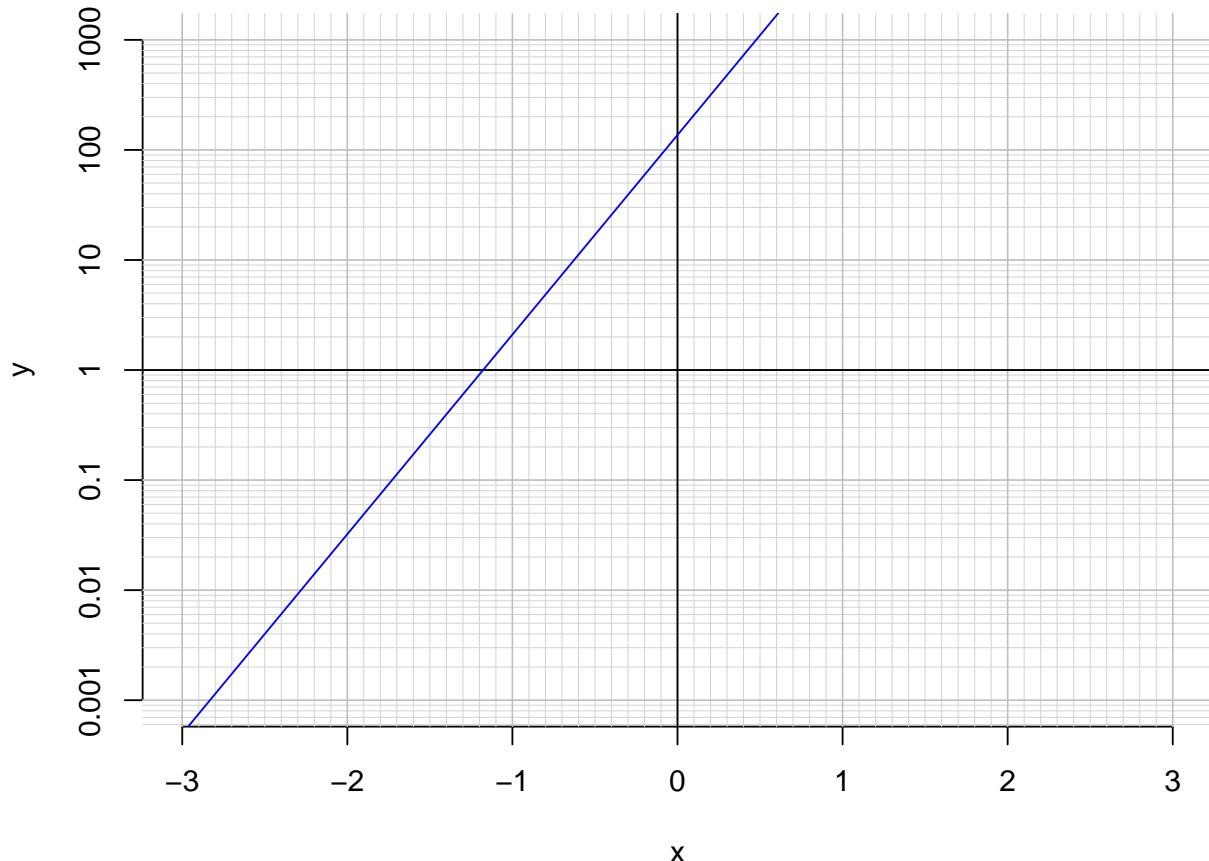
$$y = 2^{x-4} - 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$29 = \left(\frac{7}{5}\right) \cdot 2^{3t/4}$$

3. An exponential function $f(x) = 137 \cdot e^{4.18x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.3)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.004)$.

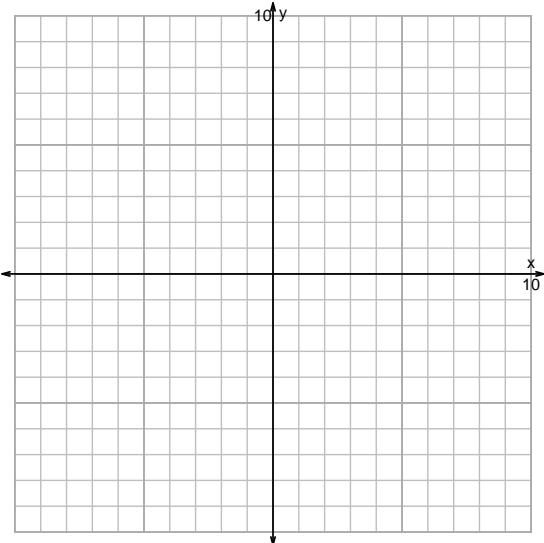
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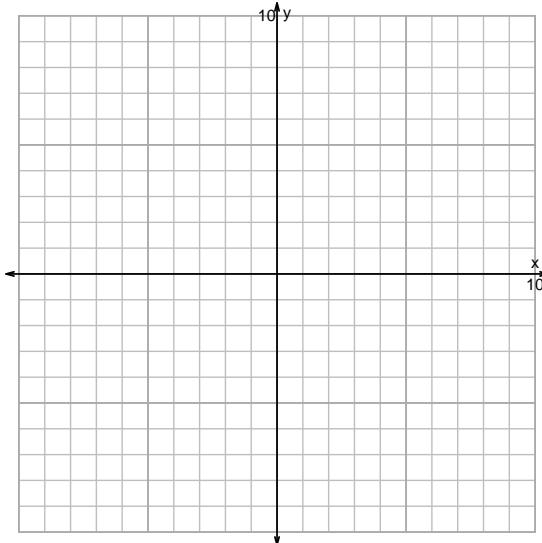
s18QUIZ: EXP LOG (PRACTICE v113)

1. Graph $y = 2^{x+3} + 4$ and $y = \log_2(x - 5) + 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+3} + 4$$



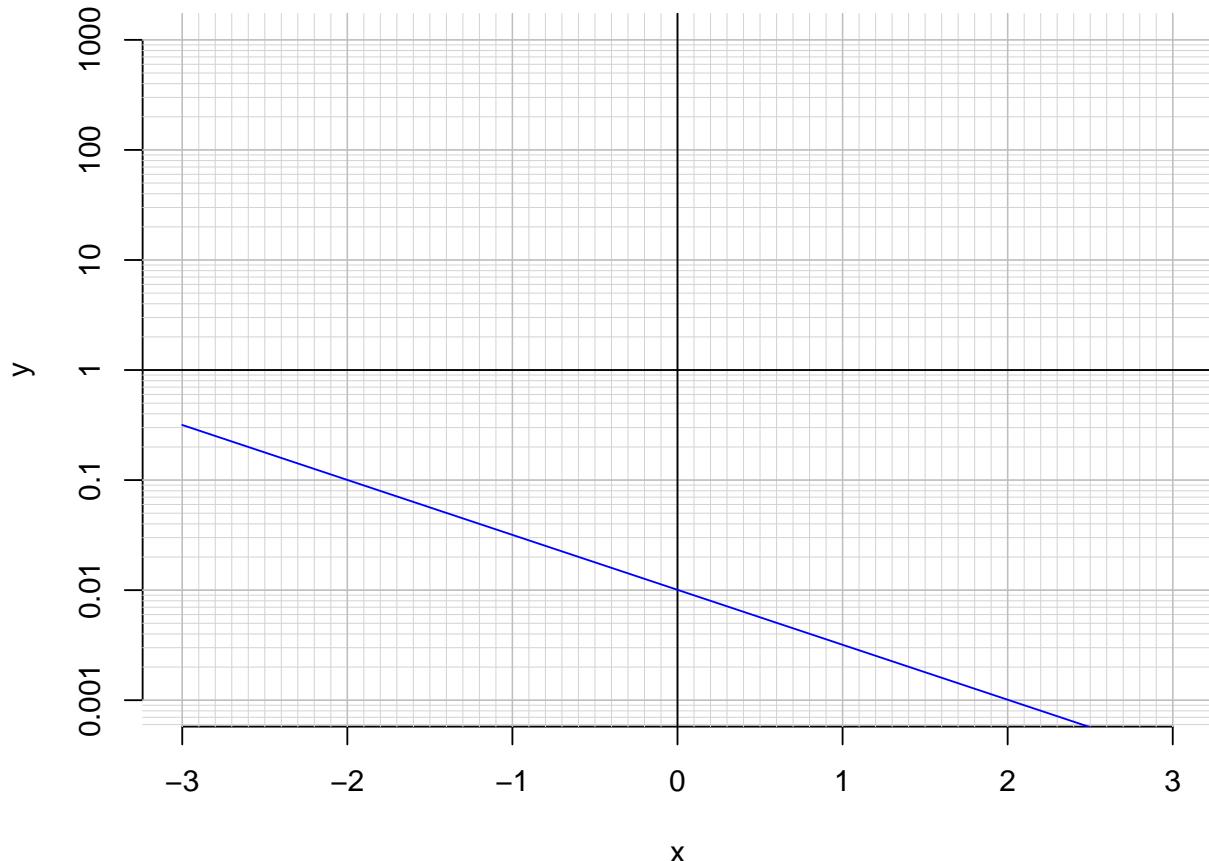
$$y = \log_2(x - 5) + 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$19 = \left(\frac{3}{5}\right) \cdot 2^{7t/4}$$

3. An exponential function $f(x) = 0.0101 \cdot e^{-1.15x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-2.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.008)$.

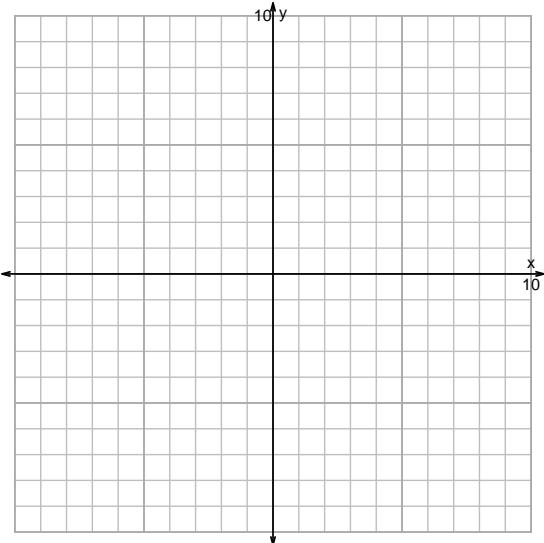
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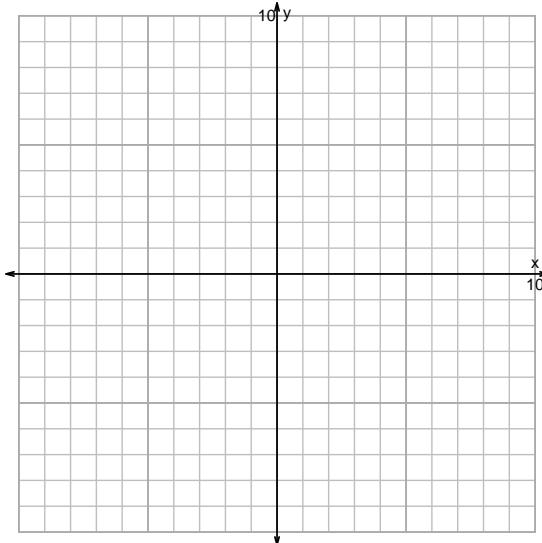
s18QUIZ: EXP LOG (PRACTICE v114)

1. Graph $y = \log_2(x + 5) - 4$ and $y = 2^{x+4} - 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 5) - 4$$



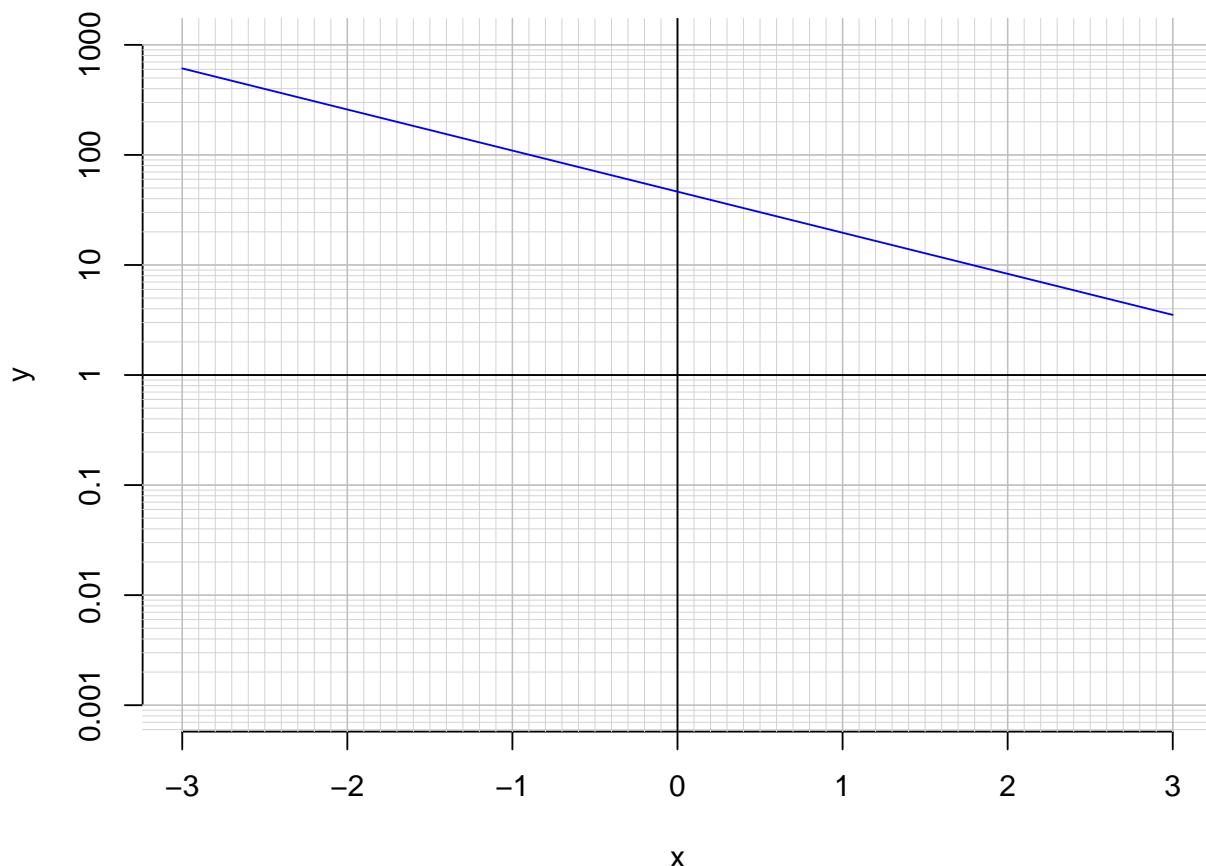
$$y = 2^{x+4} - 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$23 = \left(\frac{4}{5}\right) \cdot 2^{3t/7}$$

3. An exponential function $f(x) = 46.4 \cdot e^{-0.859x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.2)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(60)$.

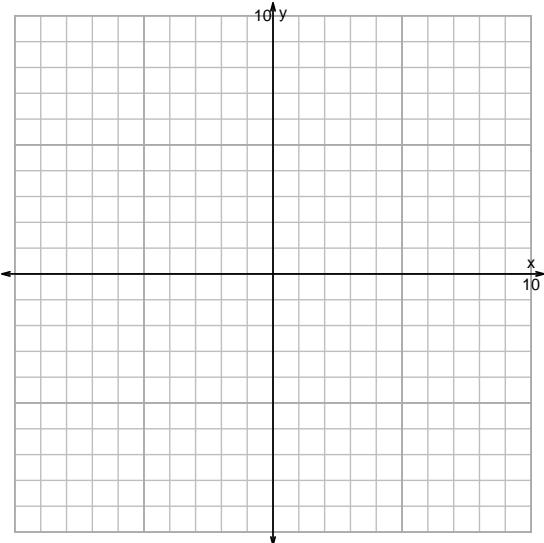
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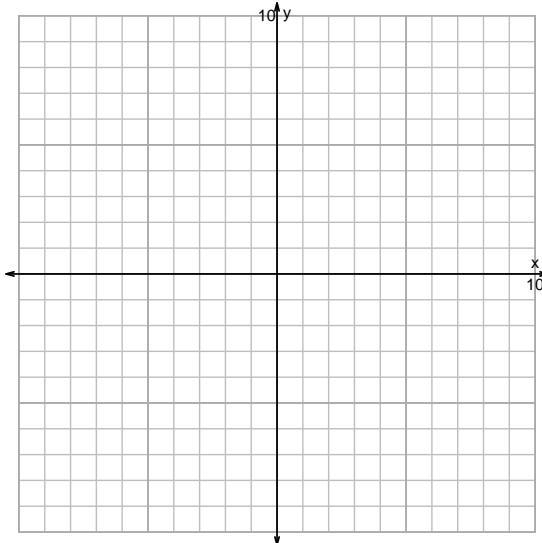
s18QUIZ: EXP LOG (PRACTICE v115)

1. Graph $y = \log_2(x - 6) - 3$ and $y = 2^{x+5} + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 6) - 3$$



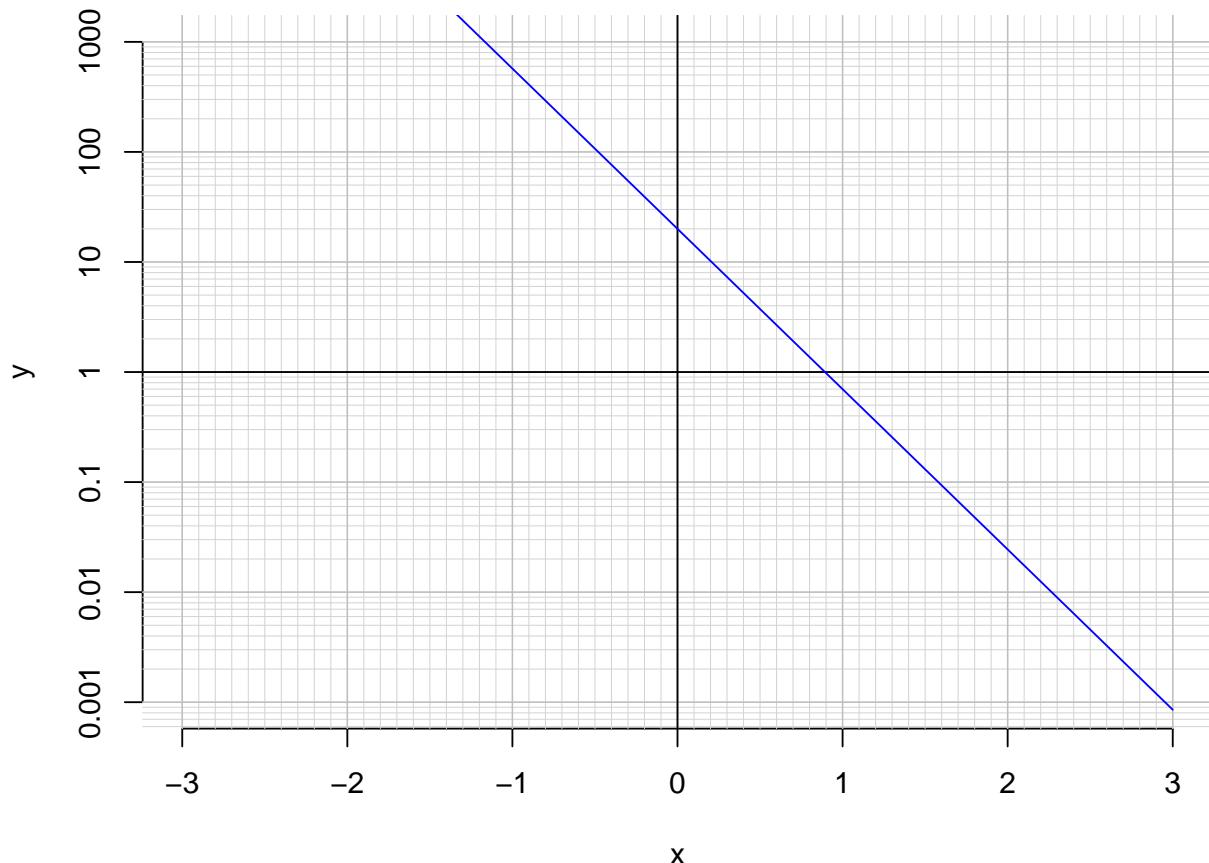
$$y = 2^{x+5} + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$23 = \left(\frac{4}{3}\right) \cdot 2^{7t/5}$$

3. An exponential function $f(x) = 20 \cdot e^{-3.35x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.1)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(800)$.

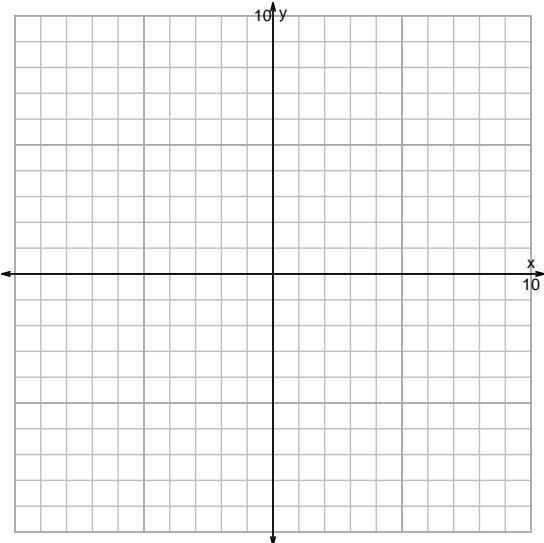
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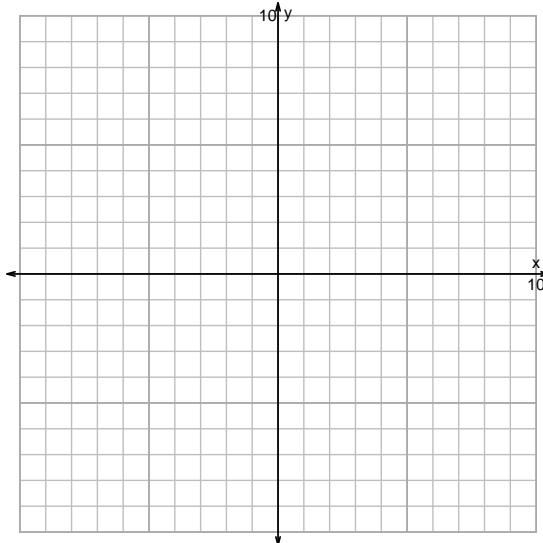
s18QUIZ: EXP LOG (PRACTICE v116)

1. Graph $y = 2^{x+5} + 6$ and $y = \log_2(x + 3) + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+5} + 6$$



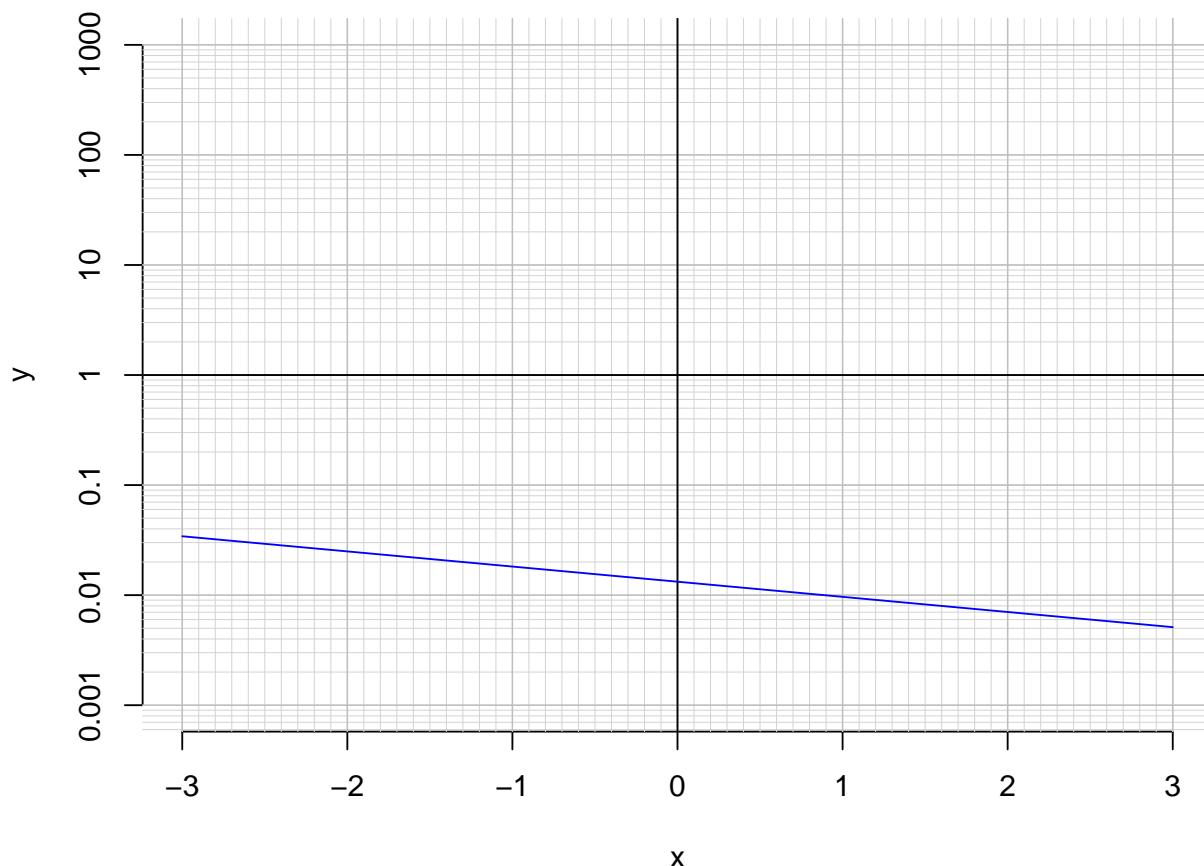
$$y = \log_2(x + 3) + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$11 = \left(\frac{7}{5}\right) \cdot 10^{-3t/4}$$

3. An exponential function $f(x) = 0.0132 \cdot e^{-0.317x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.3)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.006)$.

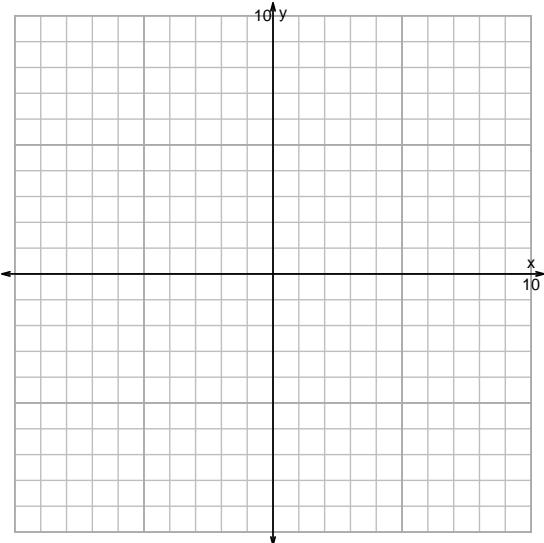
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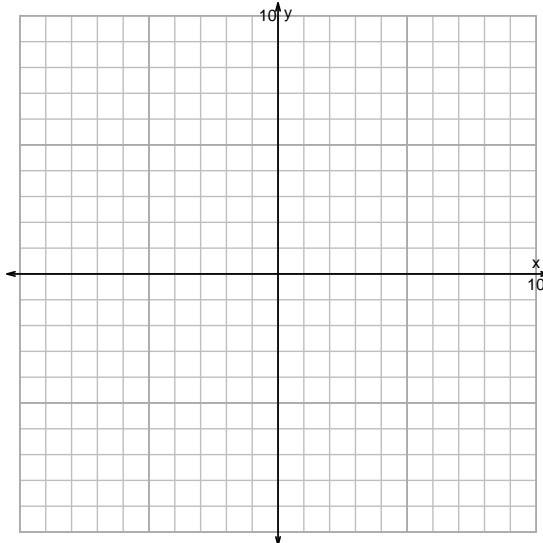
s18QUIZ: EXP LOG (PRACTICE v117)

1. Graph $y = 2^{x+5} + 4$ and $y = \log_2(x + 4) + 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+5} + 4$$



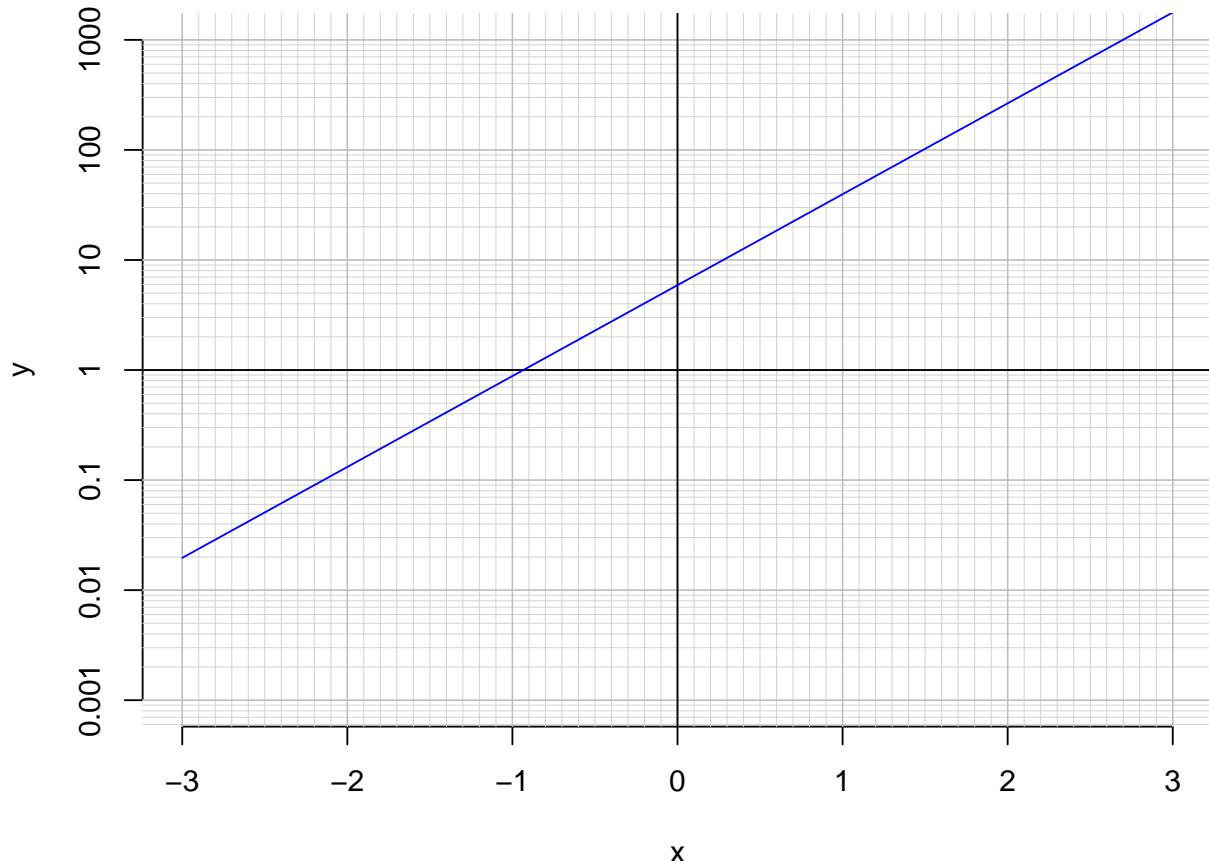
$$y = \log_2(x + 4) + 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$19 = \left(\frac{4}{3}\right) \cdot 2^{7t/5}$$

3. An exponential function $f(x) = 5.91 \cdot e^{1.9x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-2.2)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(70)$.

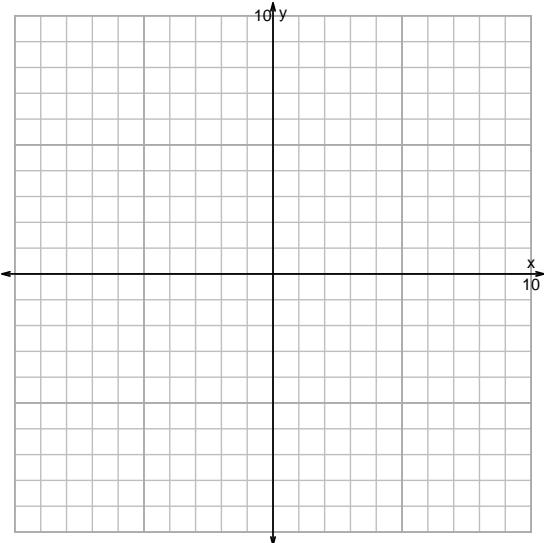
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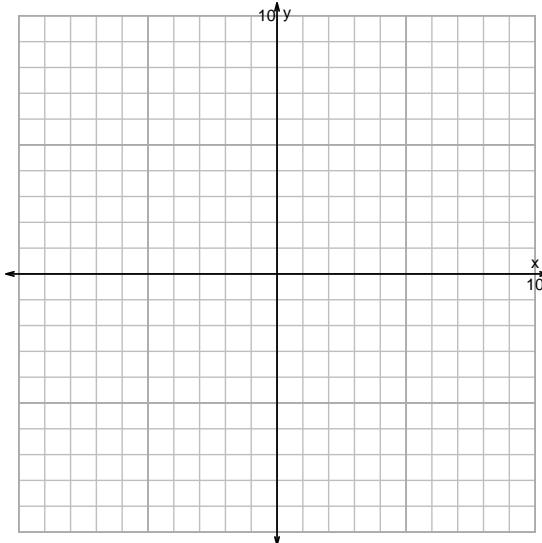
s18QUIZ: EXP LOG (PRACTICE v118)

1. Graph $y = \log_2(x + 3) - 4$ and $y = 2^{x+6} - 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 3) - 4$$



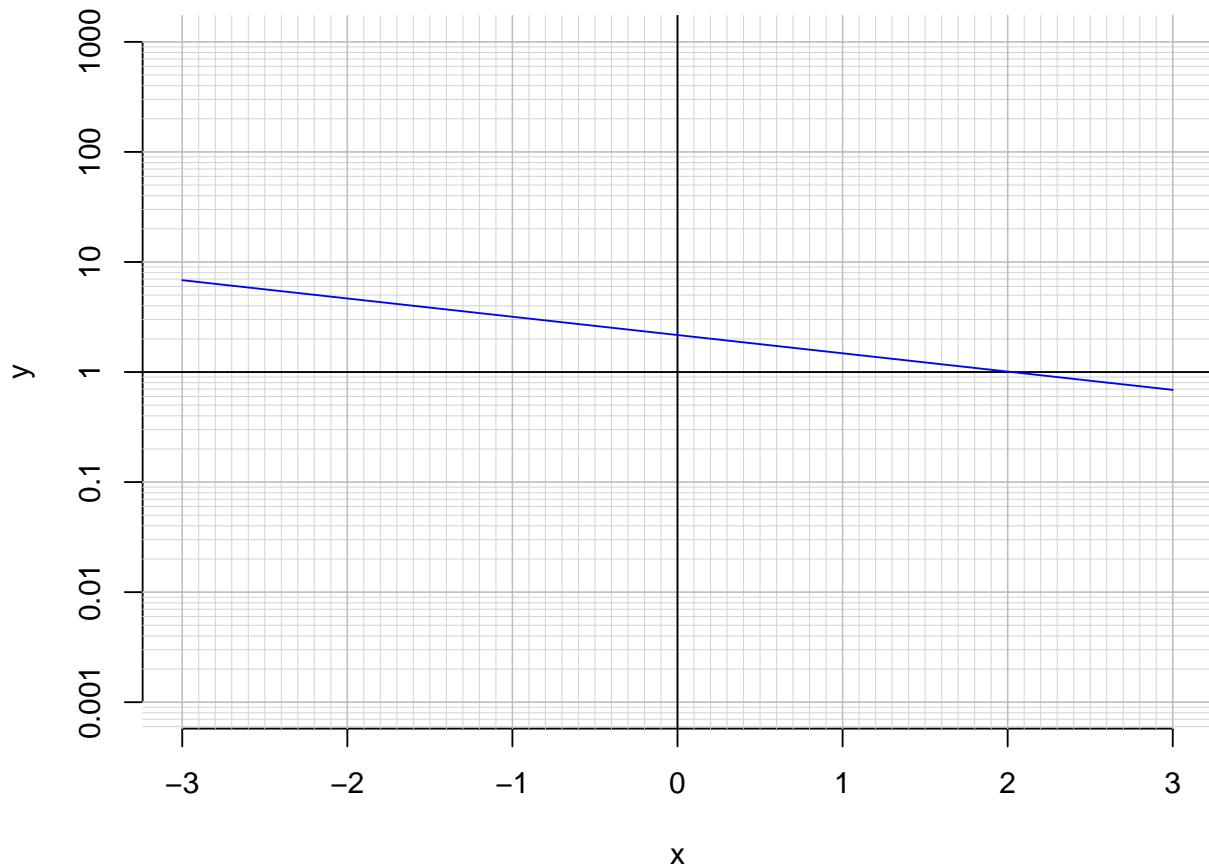
$$y = 2^{x+6} - 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$23 = \left(\frac{3}{5}\right) \cdot 10^{-4t/7}$$

3. An exponential function $f(x) = 2.17 \cdot e^{-0.382x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.9)$.

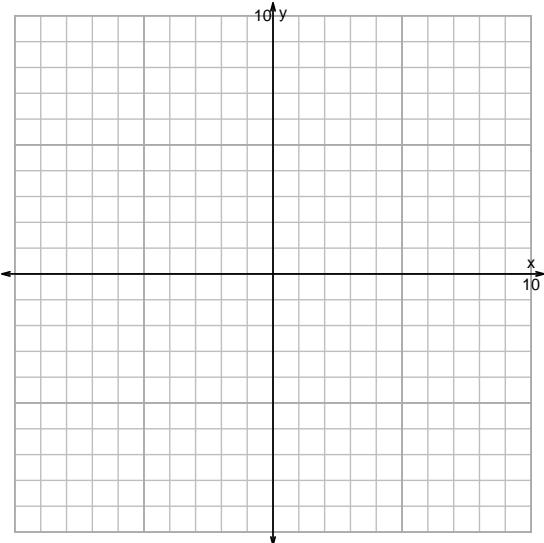
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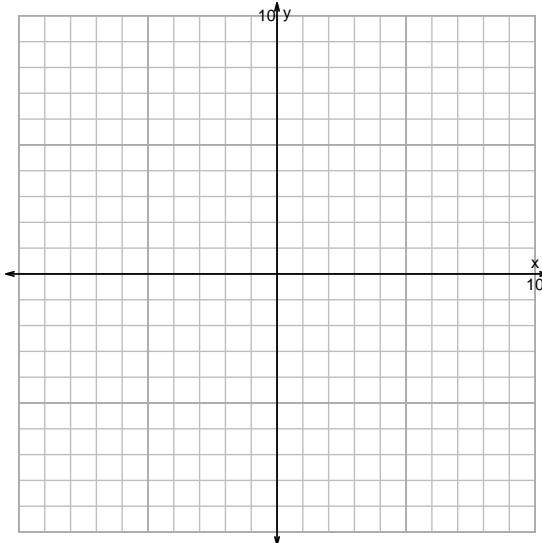
s18QUIZ: EXP LOG (PRACTICE v119)

1. Graph $y = \log_2(x + 3) - 6$ and $y = 2^{x-6} - 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 3) - 6$$



$$y = 2^{x-6} - 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-13 = \left(\frac{-7}{4}\right) \cdot 2^{3t/5}$$

3. An exponential function $f(x) = 0.524 \cdot e^{-2.86x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(0.9)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(500)$.

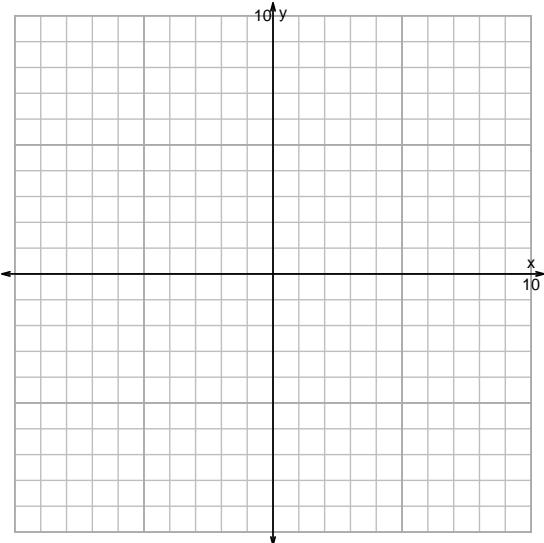
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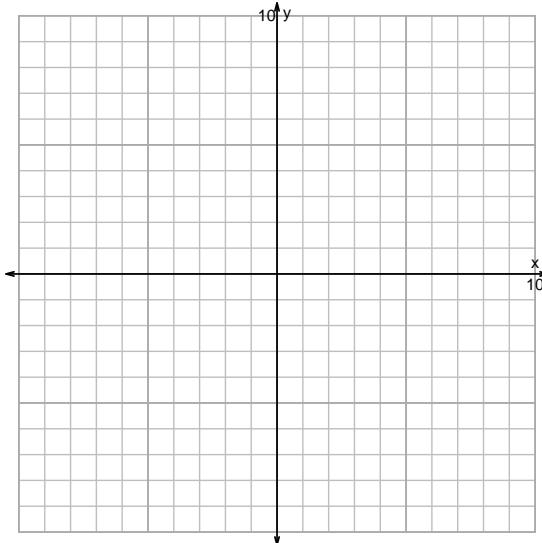
s18QUIZ: EXP LOG (PRACTICE v120)

1. Graph $y = 2^{x+3} + 5$ and $y = \log_2(x - 5) + 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+3} + 5$$



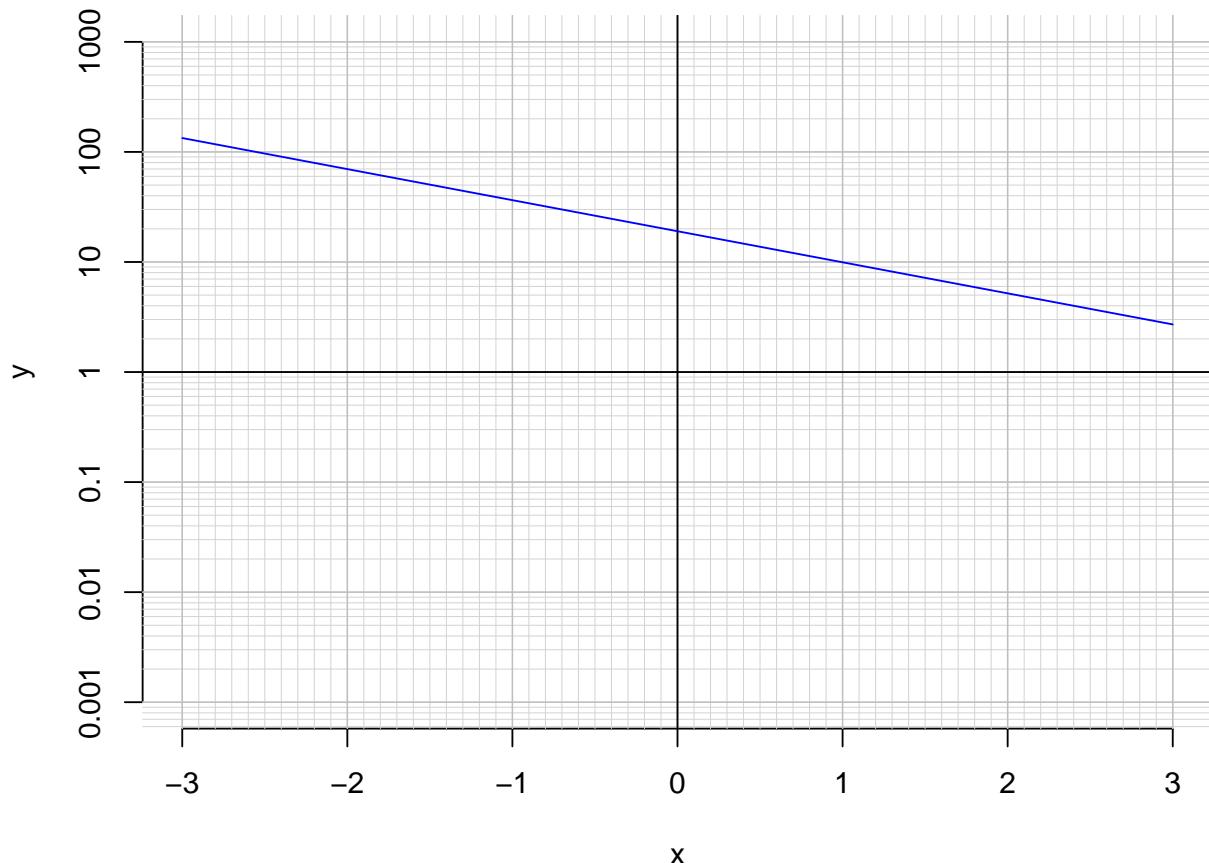
$$y = \log_2(x - 5) + 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$19 = \left(\frac{3}{5}\right) \cdot 10^{-4t/7}$$

3. An exponential function $f(x) = 19 \cdot e^{-0.65x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.7)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(4)$.

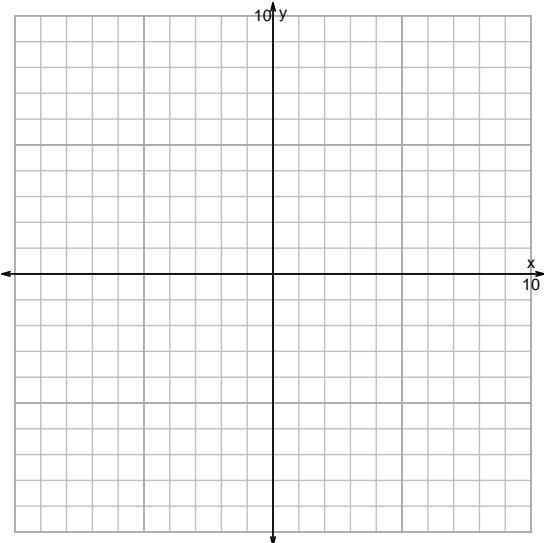
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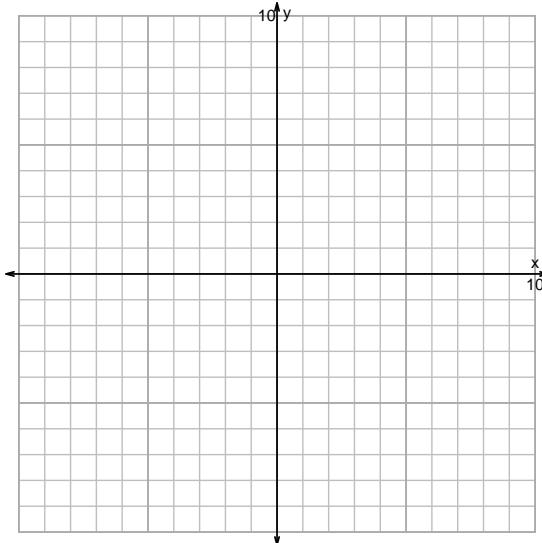
s18QUIZ: EXP LOG (PRACTICE v121)

1. Graph $y = 2^{x-6} - 5$ and $y = \log_2(x + 5) - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-6} - 5$$



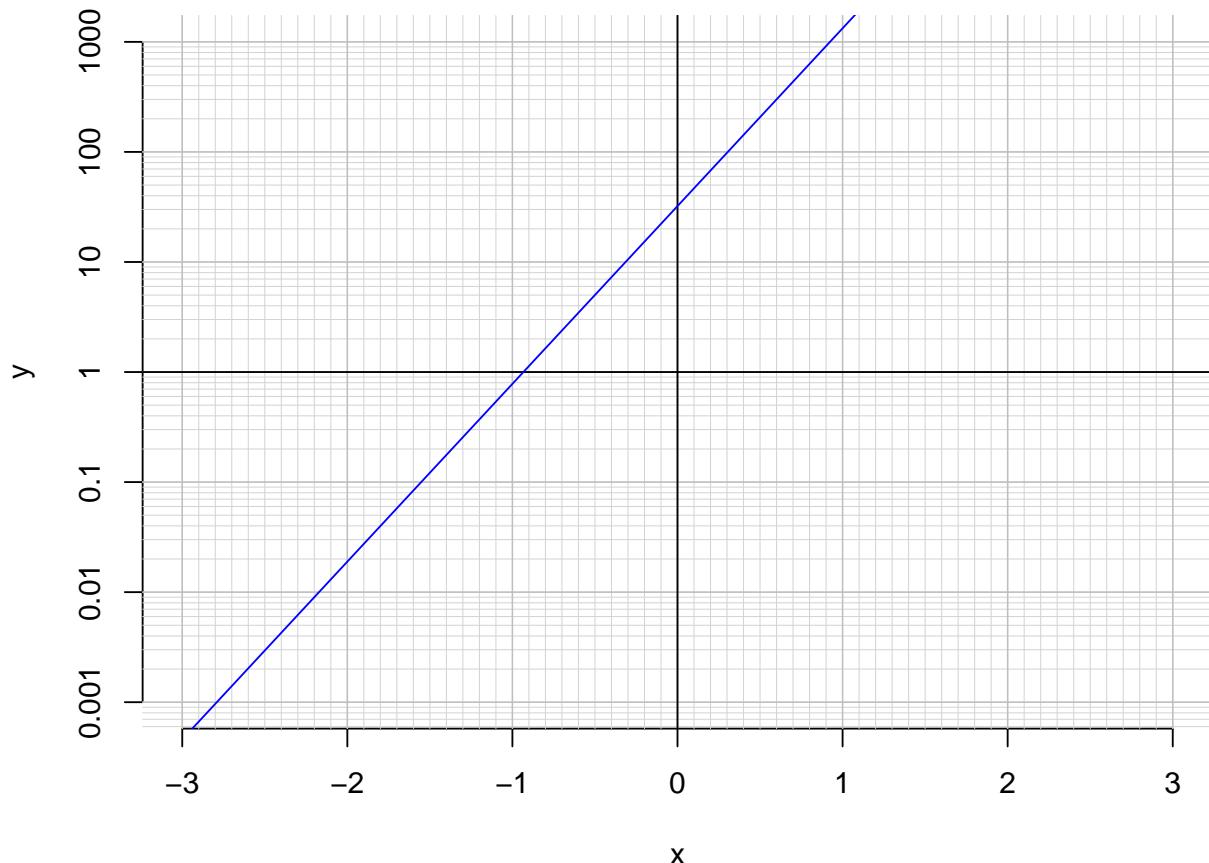
$$y = \log_2(x + 5) - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$13 = \left(\frac{3}{4}\right) \cdot 10^{-5t/7}$$

3. An exponential function $f(x) = 32.2 \cdot e^{3.72x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(0.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.009)$.

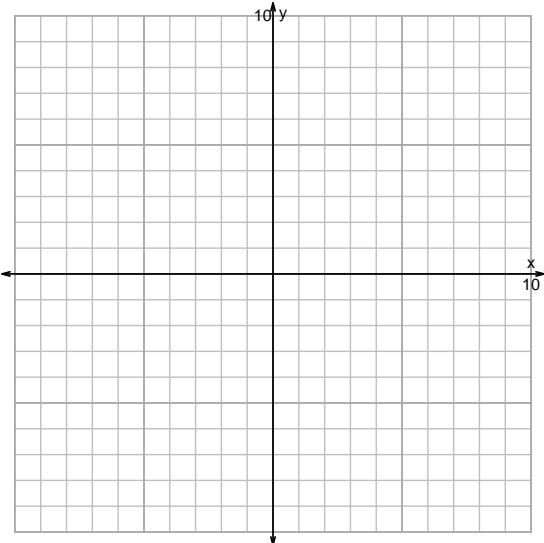
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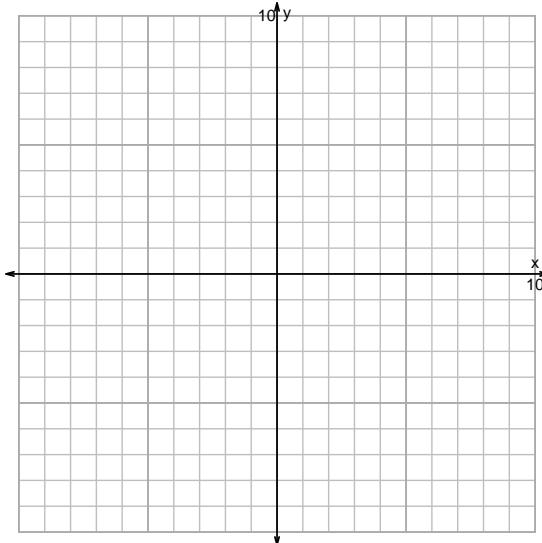
s18QUIZ: EXP LOG (PRACTICE v122)

1. Graph $y = \log_2(x + 5) - 6$ and $y = 2^{x-6} - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 5) - 6$$



$$y = 2^{x-6} - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-19 = \left(\frac{-5}{4}\right) \cdot 2^{3t/7}$$

3. An exponential function $f(x) = 1.83 \cdot e^{-1.26x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(5)$.

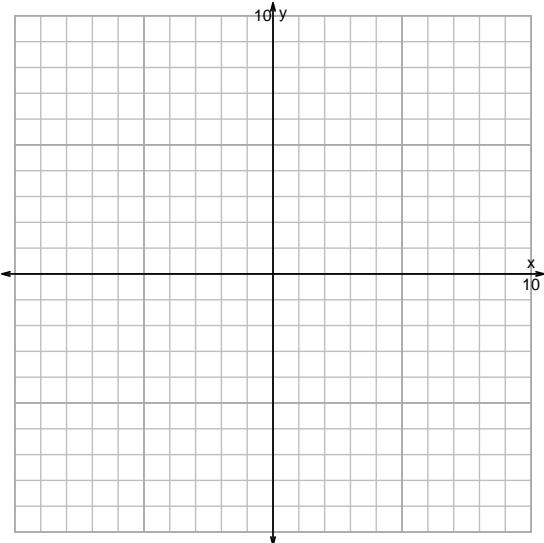
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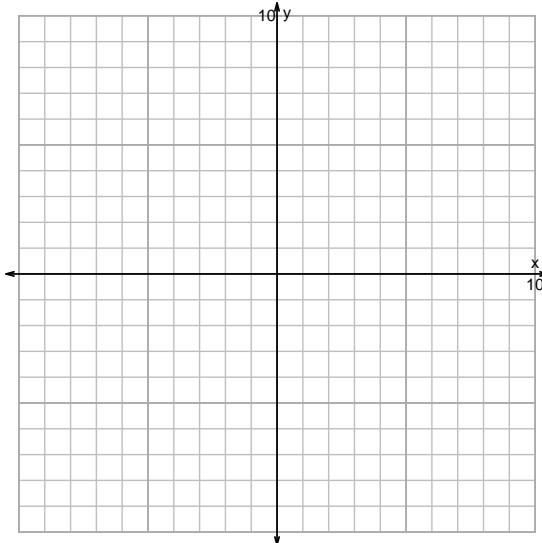
s18QUIZ: EXP LOG (PRACTICE v123)

1. Graph $y = 2^{x+5} + 6$ and $y = \log_2(x - 5) + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+5} + 6$$



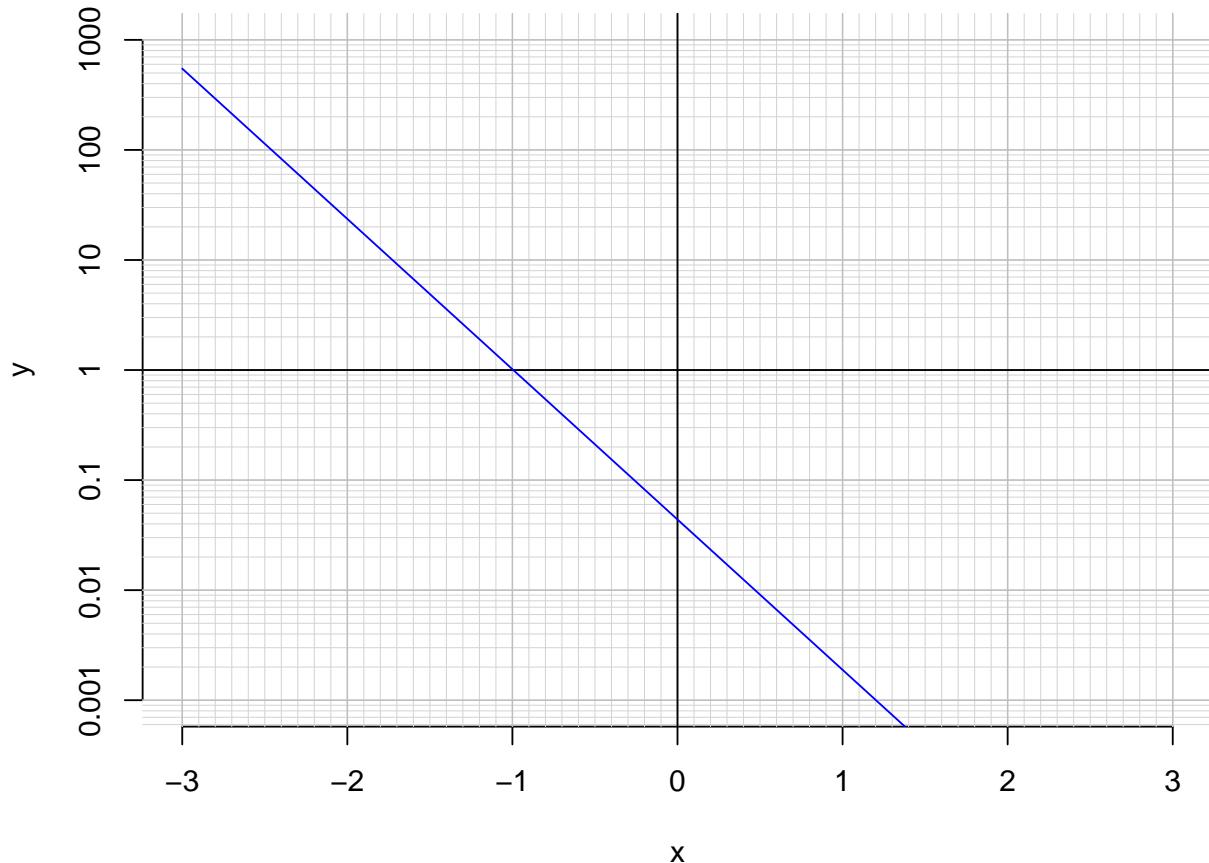
$$y = \log_2(x - 5) + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-17 = \left(\frac{-4}{7}\right) \cdot 10^{3t/5}$$

3. An exponential function $f(x) = 0.0438 \cdot e^{-3.14x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.1)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(400)$.

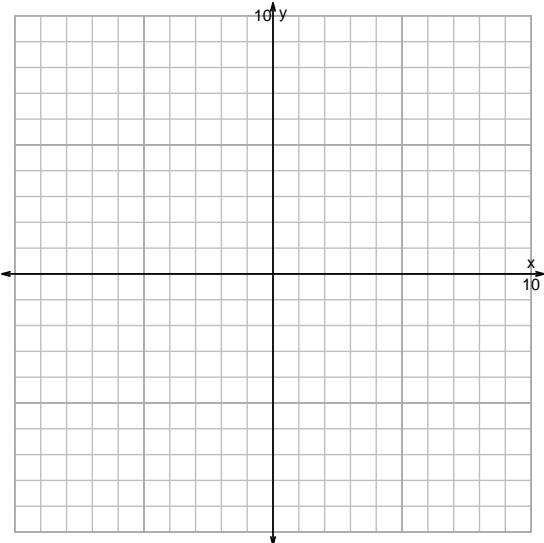
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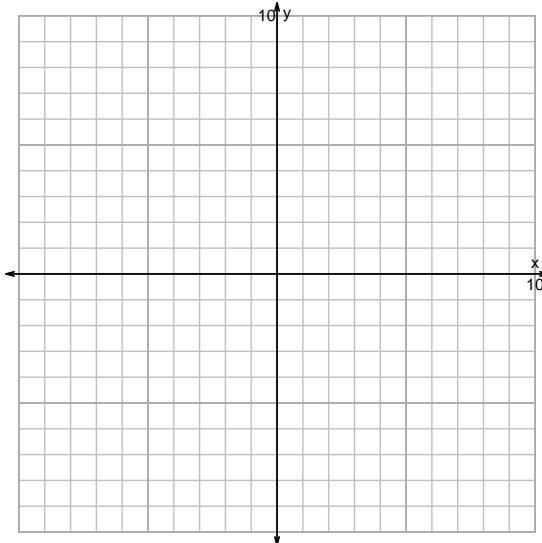
s18QUIZ: EXP LOG (PRACTICE v124)

1. Graph $y = 2^{x-3} - 5$ and $y = \log_2(x + 3) + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-3} - 5$$



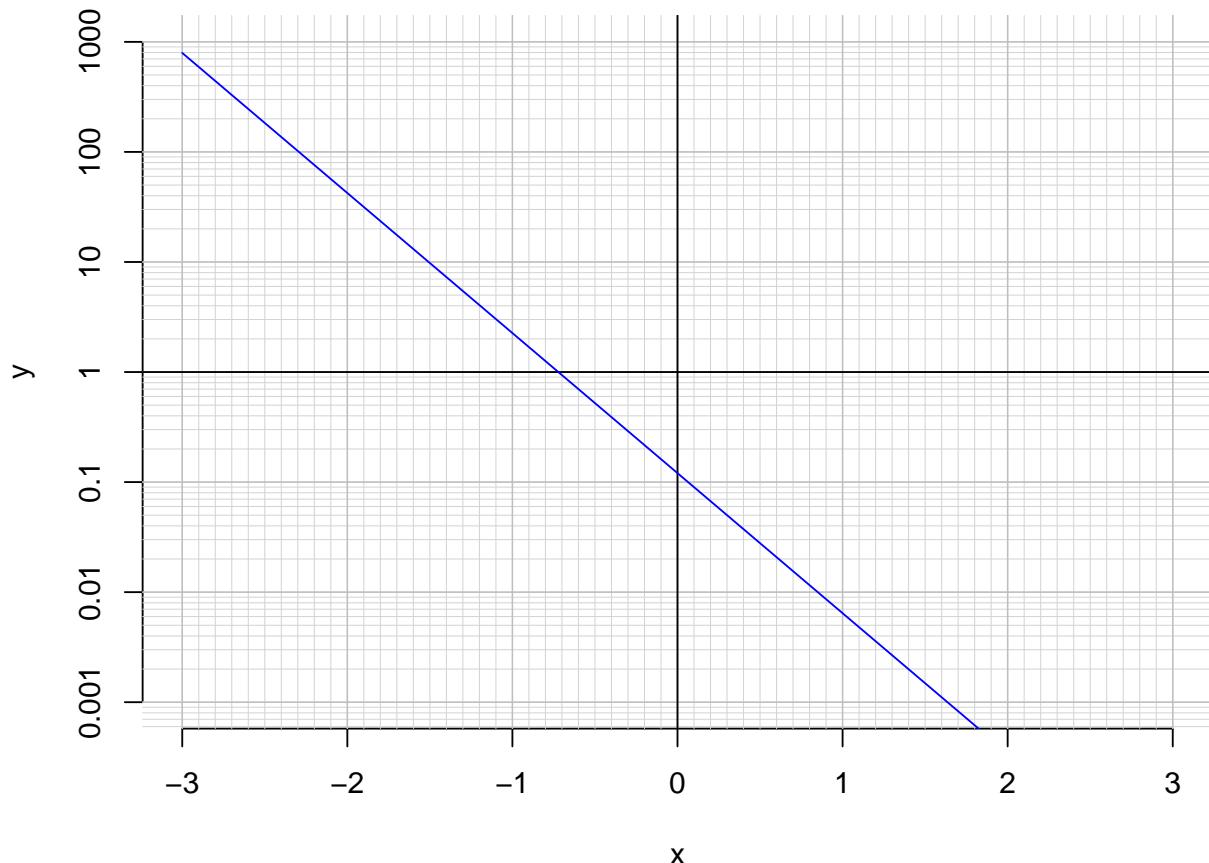
$$y = \log_2(x + 3) + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$13 = \left(\frac{7}{4}\right) \cdot 2^{5t/3}$$

3. An exponential function $f(x) = 0.121 \cdot e^{-2.93x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.09)$.

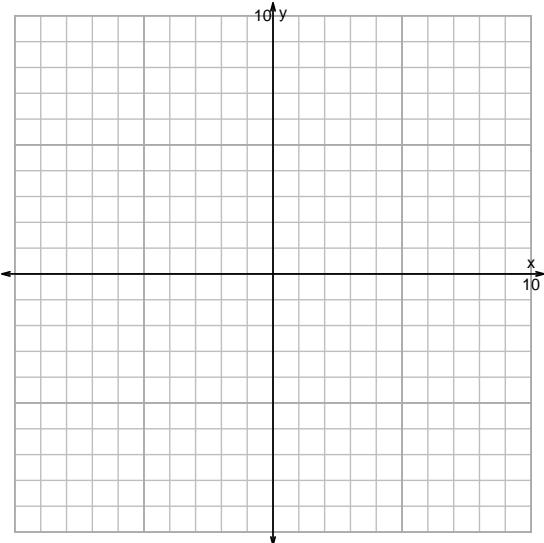
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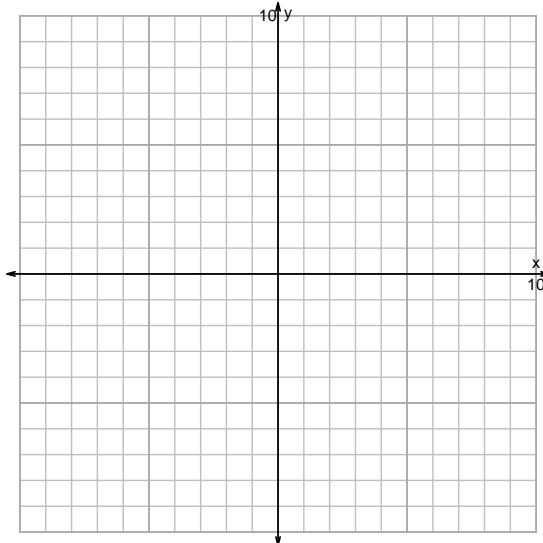
s18QUIZ: EXP LOG (PRACTICE v125)

1. Graph $y = 2^{x+4} + 6$ and $y = \log_2(x + 6) - 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+4} + 6$$



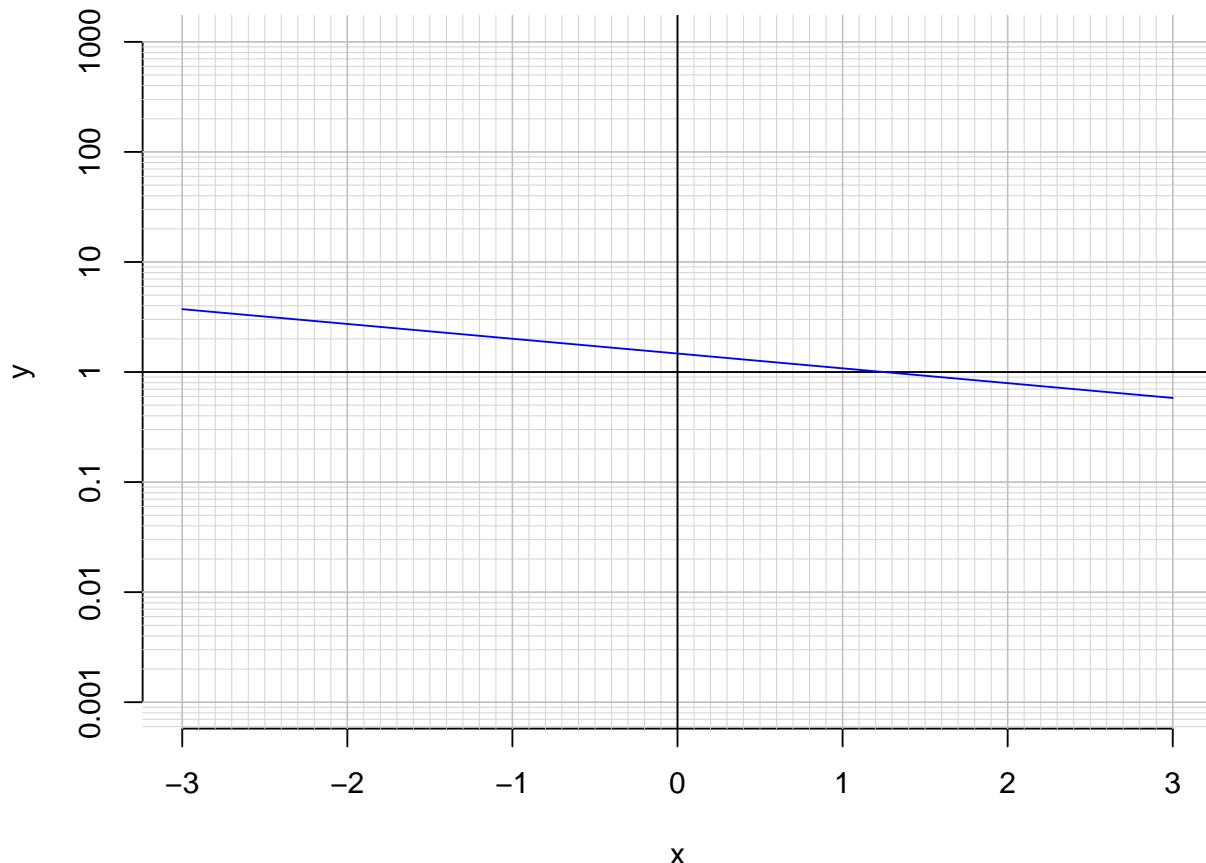
$$y = \log_2(x + 6) - 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-13 = \left(\frac{-3}{5}\right) \cdot 10^{-7t/4}$$

3. An exponential function $f(x) = 1.47 \cdot e^{-0.31x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.9)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(3)$.

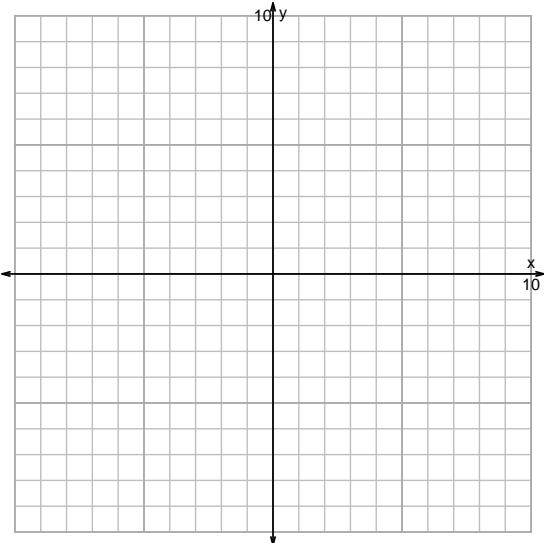
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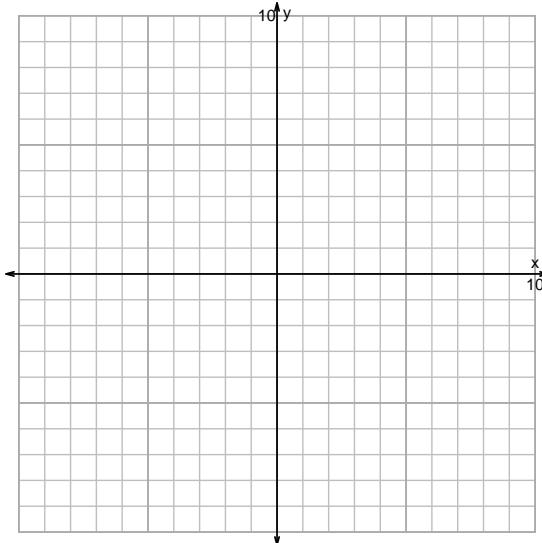
s18QUIZ: EXP LOG (PRACTICE v126)

1. Graph $y = \log_2(x + 4) + 3$ and $y = 2^{x+4} - 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 4) + 3$$



$$y = 2^{x+4} - 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$13 = \left(\frac{4}{3}\right) \cdot 10^{7t/5}$$

3. An exponential function $f(x) = 198 \cdot e^{-1.86x}$ is graphed below on a semi-log plot.



- a. Using the plot above, evaluate $f(2.1)$.
- b. Express $f^{-1}(x)$, the inverse of f .
- c. Using the plot above, evaluate $f^{-1}(500)$.

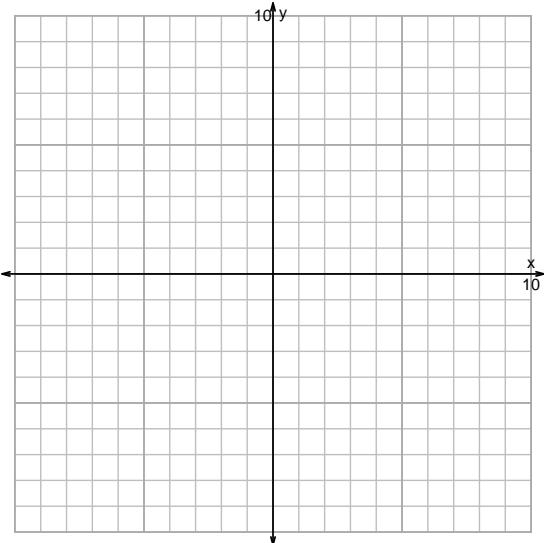
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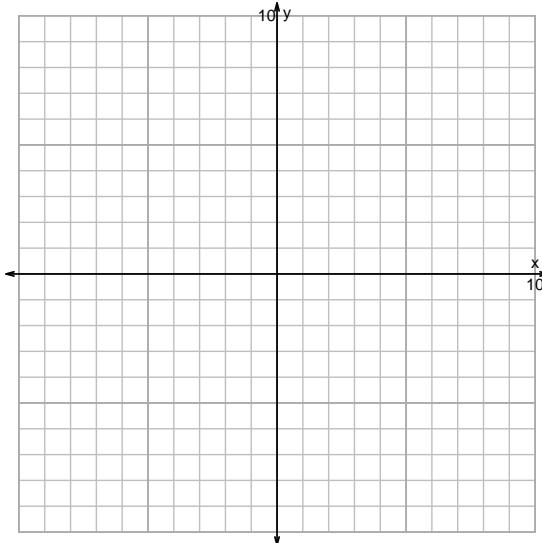
s18QUIZ: EXP LOG (PRACTICE v127)

1. Graph $y = 2^{x-3} - 5$ and $y = \log_2(x-3) - 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-3} - 5$$



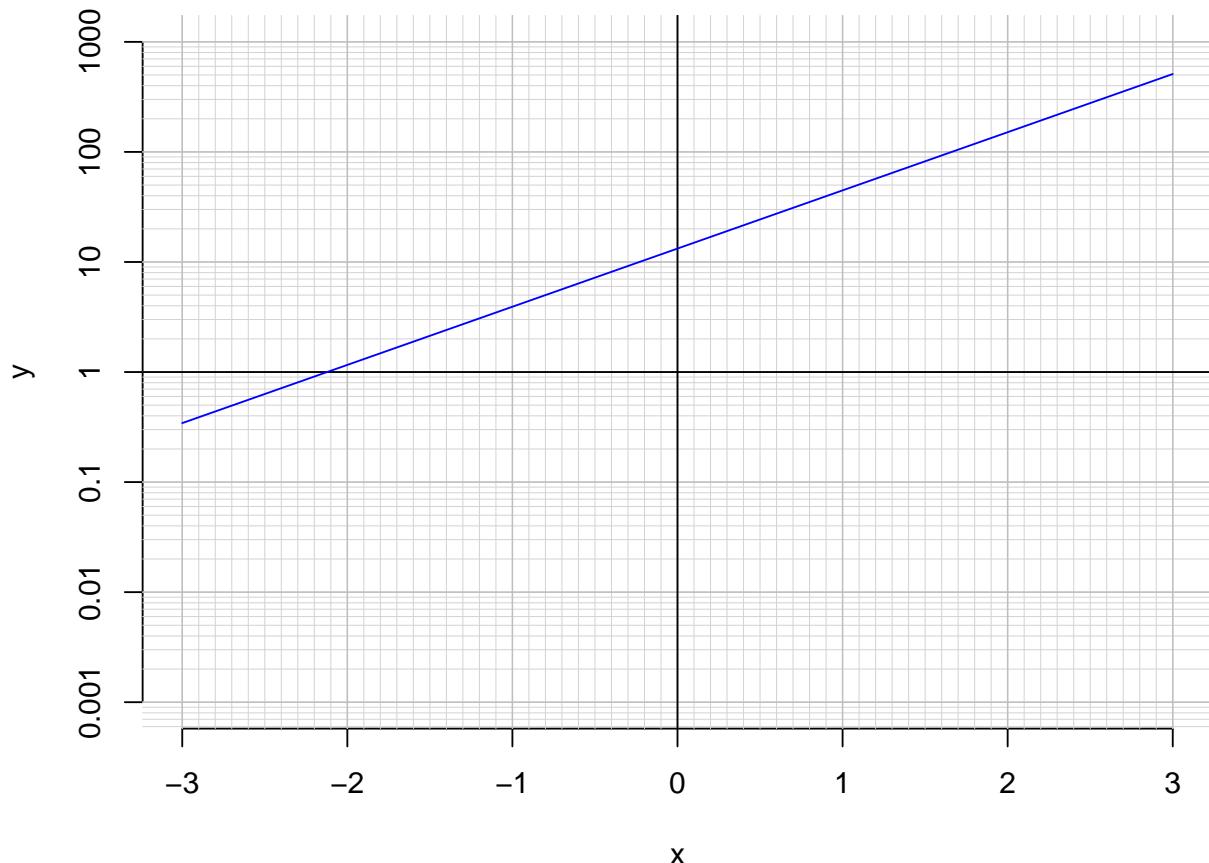
$$y = \log_2(x-3) - 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$11 = \left(\frac{4}{5}\right) \cdot 2^{3t/7}$$

3. An exponential function $f(x) = 13.2 \cdot e^{1.22x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.8)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(5)$.

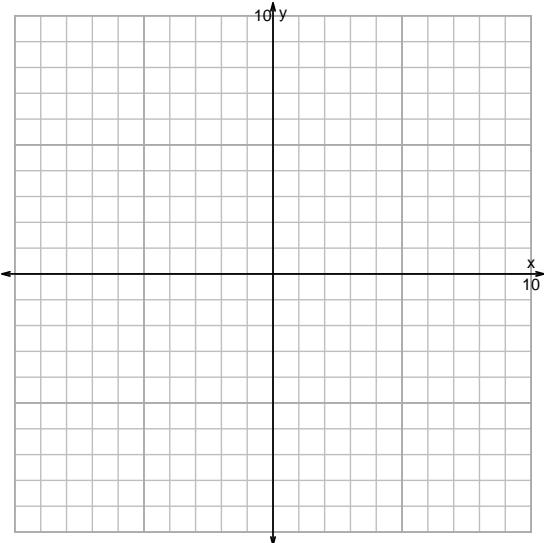
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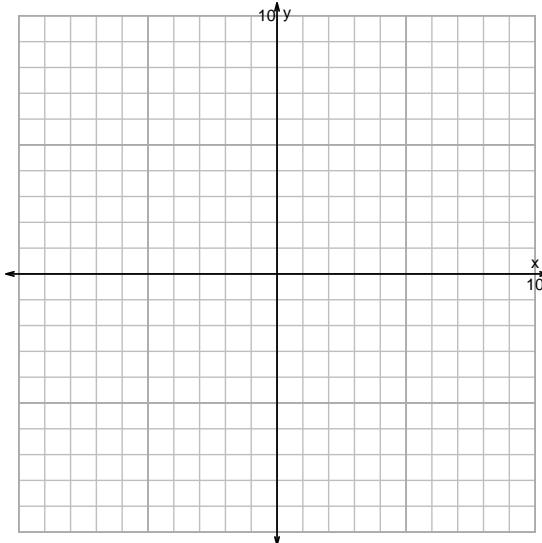
s18QUIZ: EXP LOG (PRACTICE v128)

1. Graph $y = \log_2(x + 4) - 6$ and $y = 2^{x+6} + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 4) - 6$$



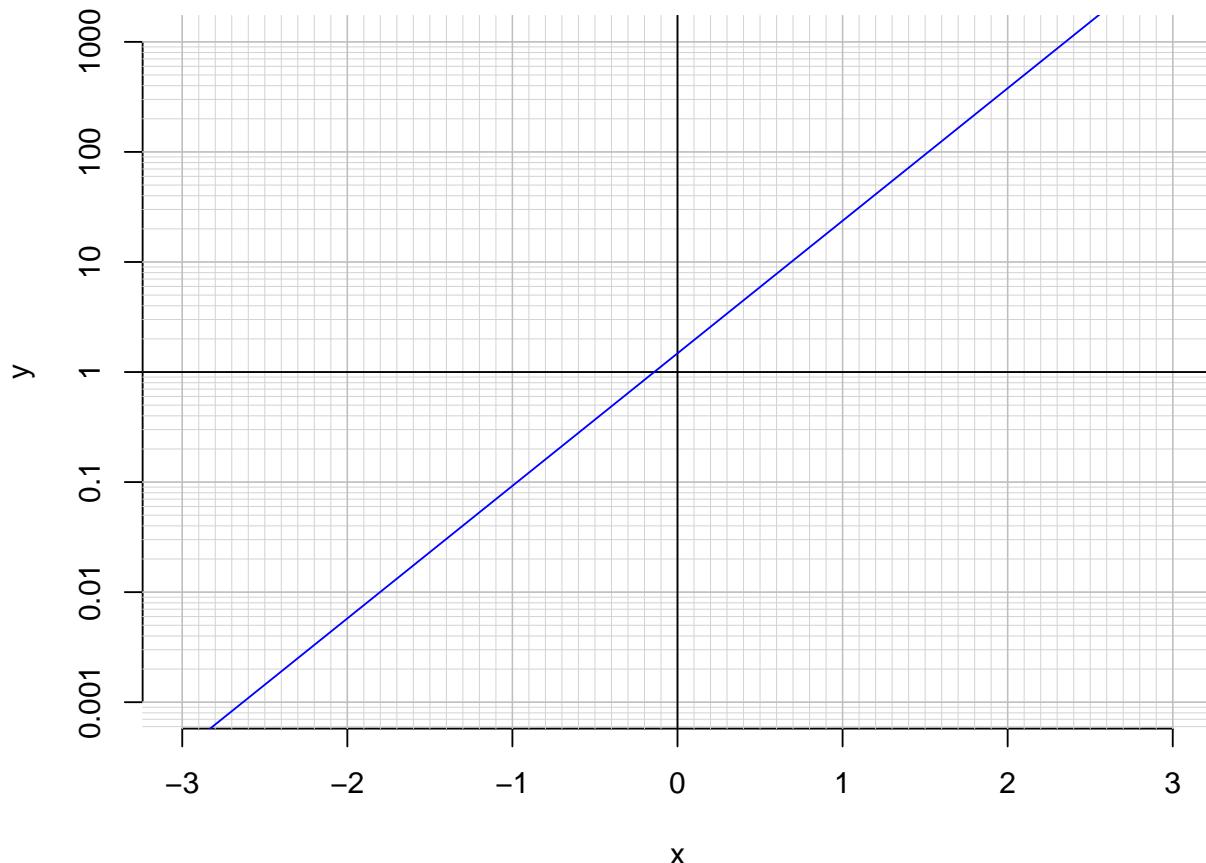
$$y = 2^{x+6} + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$13 = \left(\frac{7}{5}\right) \cdot 2^{-4t/3}$$

3. An exponential function $f(x) = 1.48 \cdot e^{2.77x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.1)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.07)$.

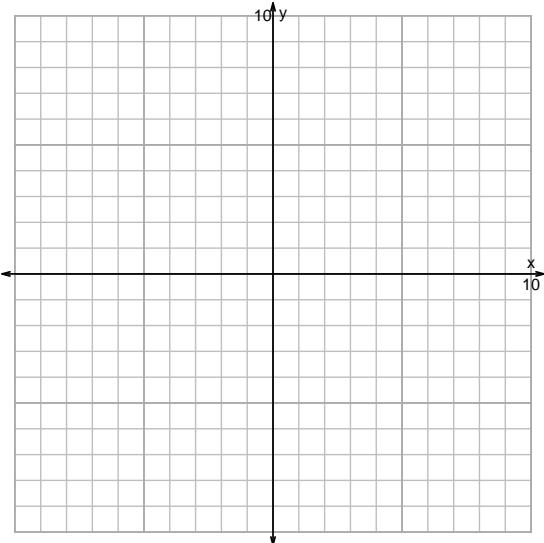
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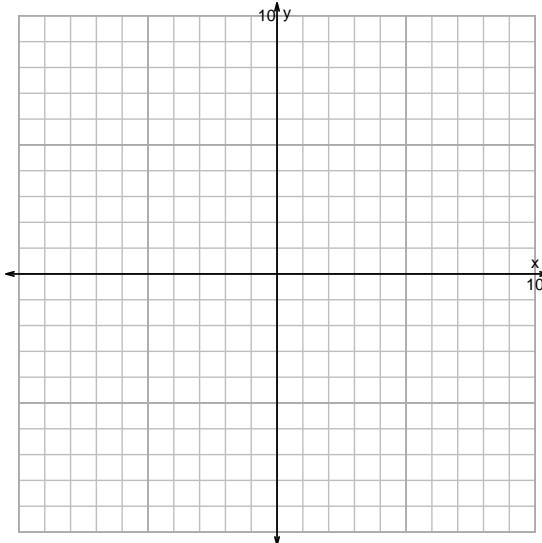
s18QUIZ: EXP LOG (PRACTICE v129)

1. Graph $y = \log_2(x - 4) + 5$ and $y = 2^{x-3} - 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 4) + 5$$



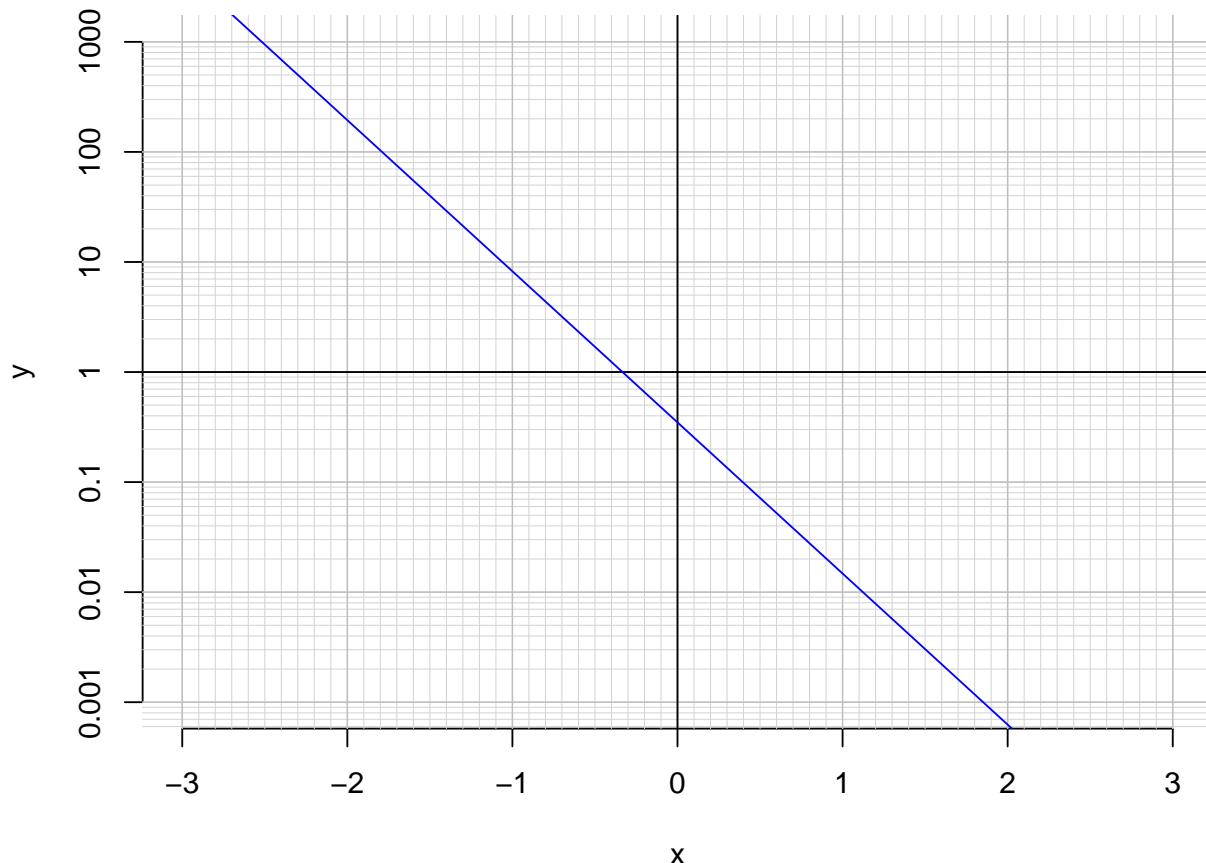
$$y = 2^{x-3} - 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-11 = \left(\frac{-5}{4}\right) \cdot 2^{3t/7}$$

3. An exponential function $f(x) = 0.349 \cdot e^{-3.16x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.9)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(40)$.

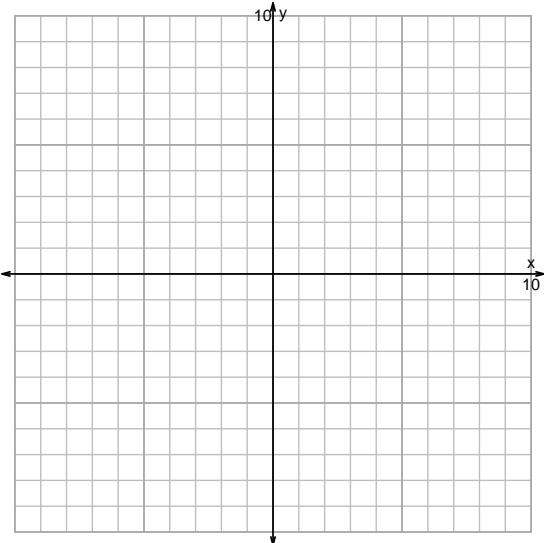
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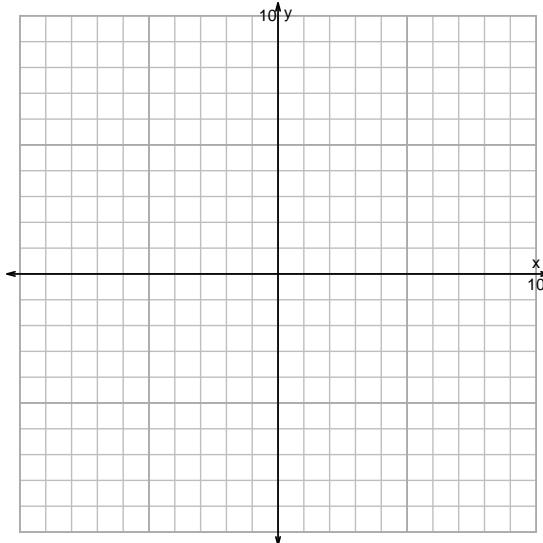
s18QUIZ: EXP LOG (PRACTICE v130)

1. Graph $y = 2^{x+5} + 3$ and $y = \log_2(x - 5) + 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+5} + 3$$



$$y = \log_2(x - 5) + 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-23 = \left(\frac{-4}{5}\right) \cdot 2^{-3t/7}$$

3. An exponential function $f(x) = 0.213 \cdot e^{-2.11x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.5)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.4)$.

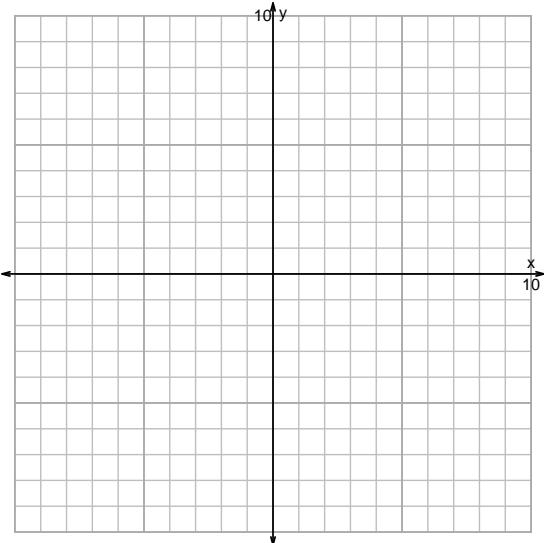
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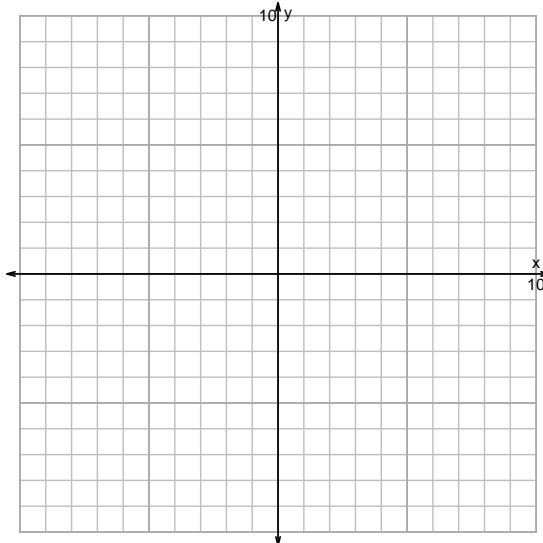
s18QUIZ: EXP LOG (PRACTICE v131)

1. Graph $y = \log_2(x + 5) - 4$ and $y = 2^{x-4} + 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 5) - 4$$



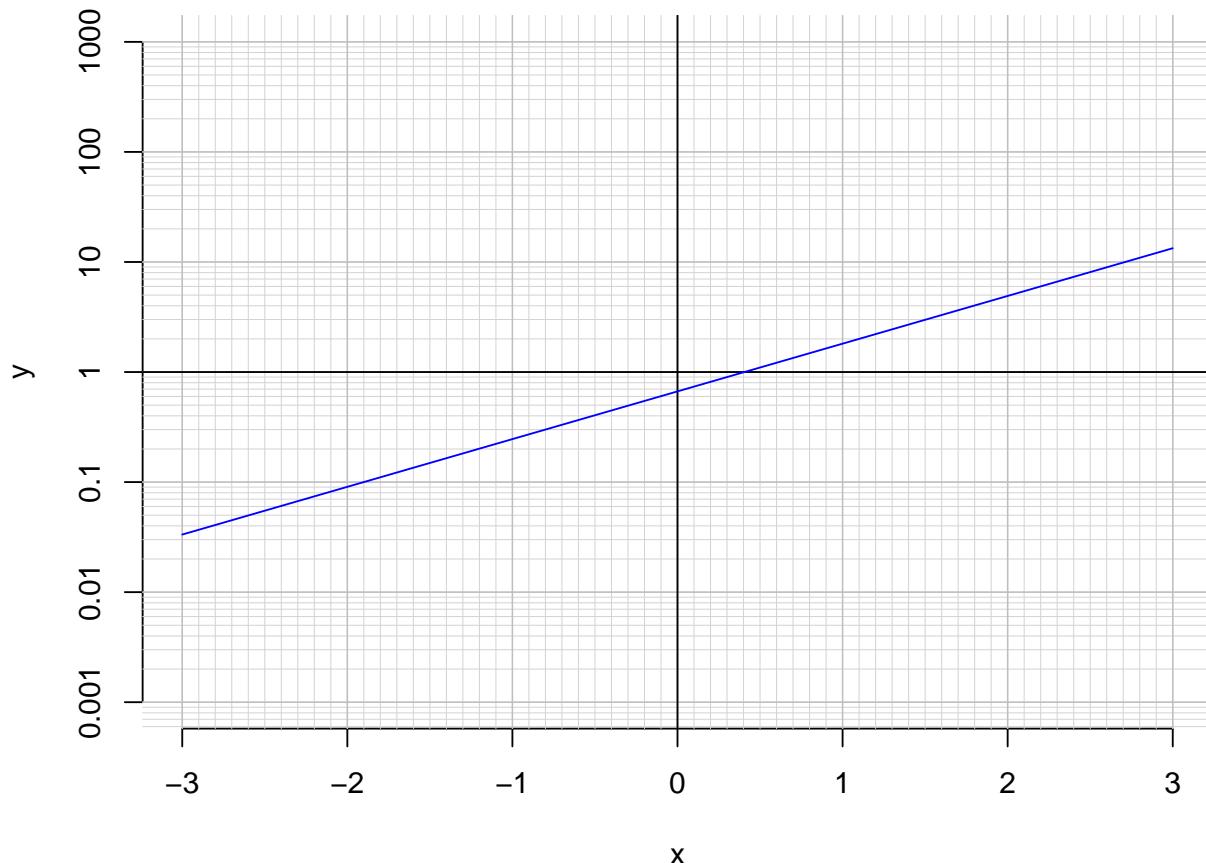
$$y = 2^{x-4} + 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-19 = \left(\frac{-5}{7}\right) \cdot 10^{3t/4}$$

3. An exponential function $f(x) = 0.667 \cdot e^{0.998x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.2)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.9)$.

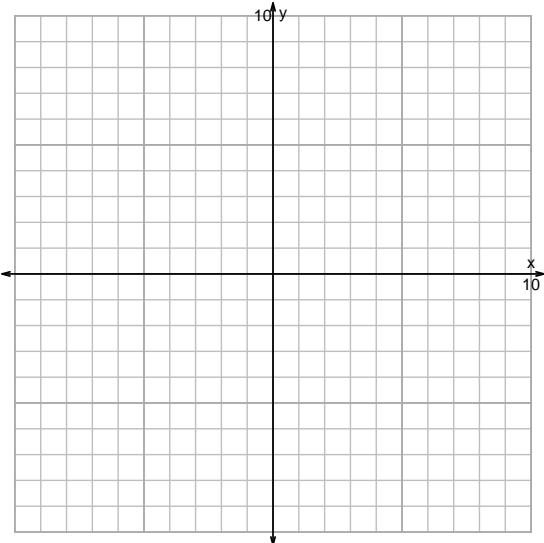
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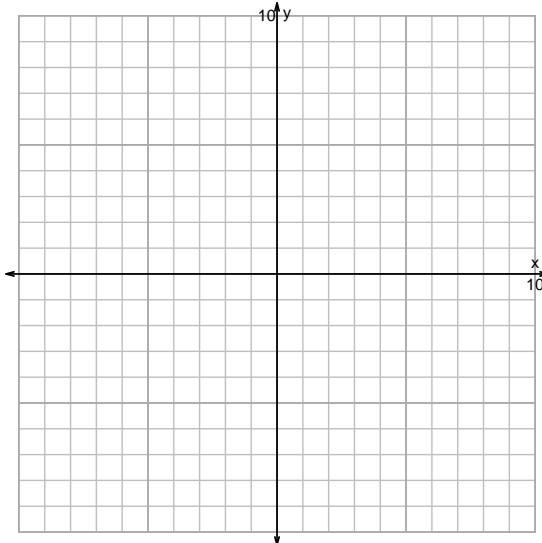
s18QUIZ: EXP LOG (PRACTICE v132)

1. Graph $y = 2^{x+5} + 6$ and $y = \log_2(x - 6) - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+5} + 6$$



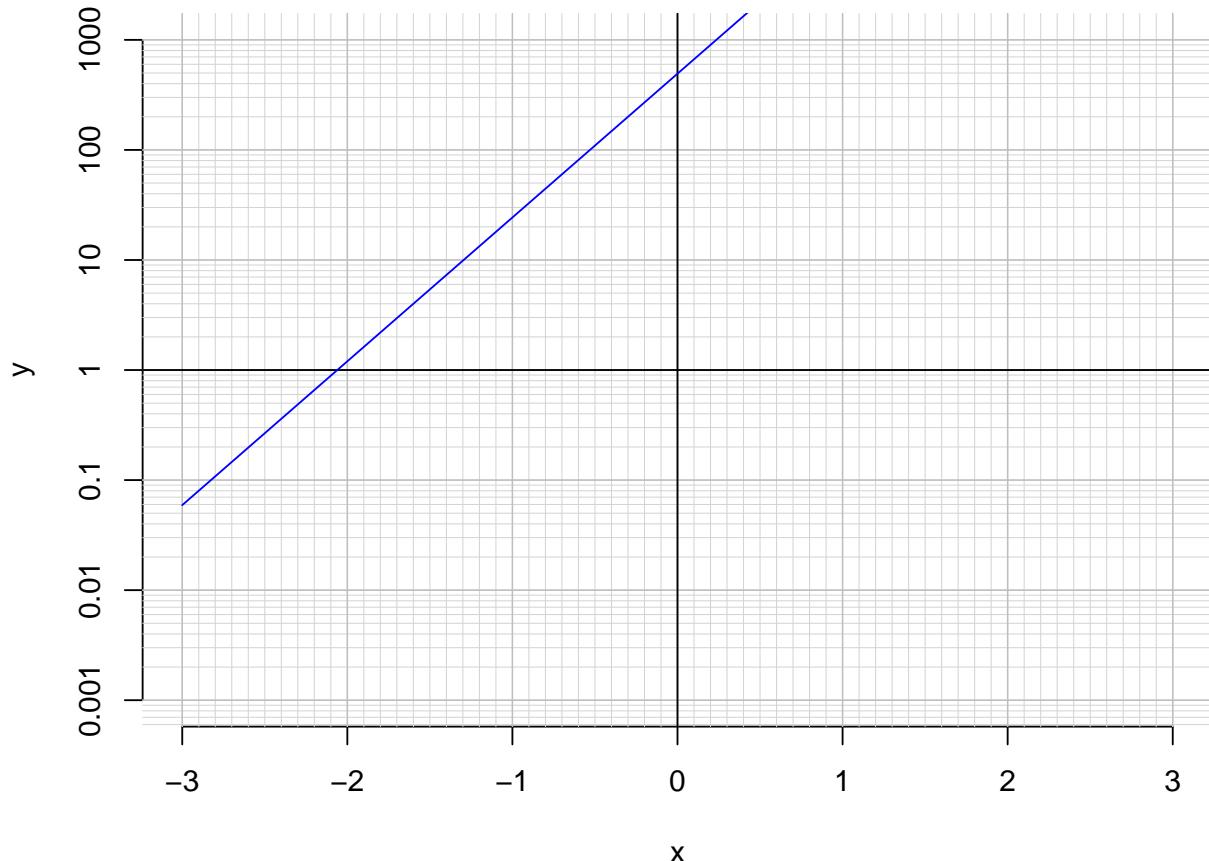
$$y = \log_2(x - 6) - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$13 = \left(\frac{3}{4}\right) \cdot 10^{5t/7}$$

3. An exponential function $f(x) = 493 \cdot e^{3.01x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(900)$.

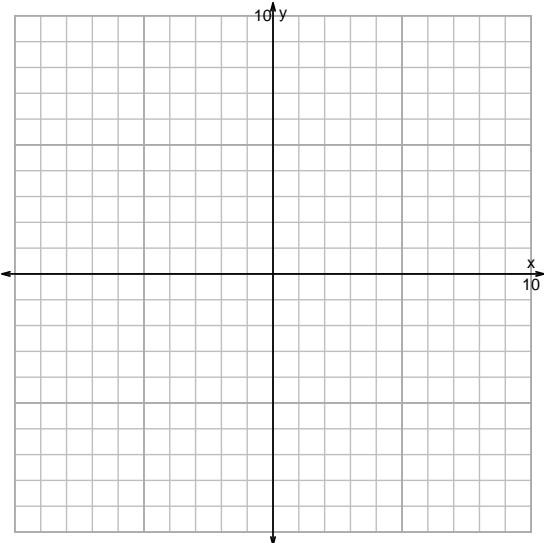
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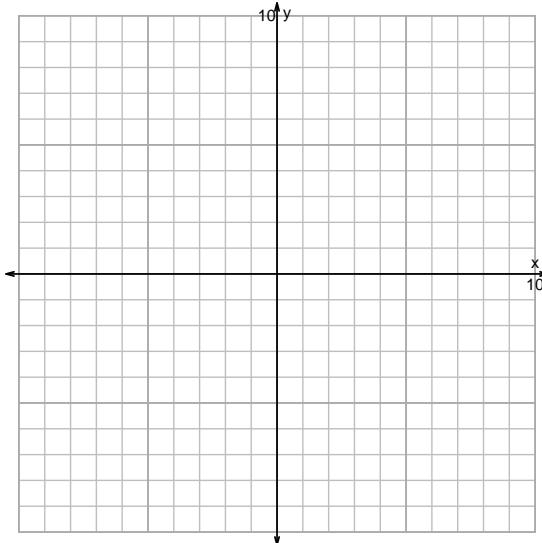
s18QUIZ: EXP LOG (PRACTICE v133)

1. Graph $y = \log_2(x + 3) + 6$ and $y = 2^{x-3} - 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 3) + 6$$



$$y = 2^{x-3} - 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$11 = \left(\frac{7}{4}\right) \cdot 2^{-5t/3}$$

3. An exponential function $f(x) = 12.3 \cdot e^{-1.55x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-2.7)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.3)$.

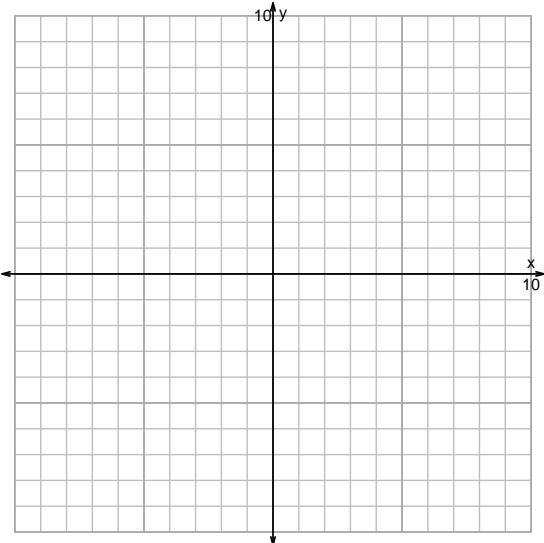
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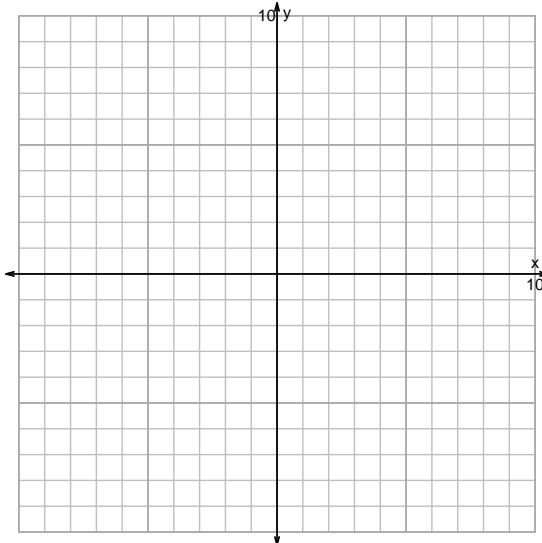
s18QUIZ: EXP LOG (PRACTICE v134)

1. Graph $y = 2^{x-6} - 4$ and $y = \log_2(x + 4) + 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-6} - 4$$



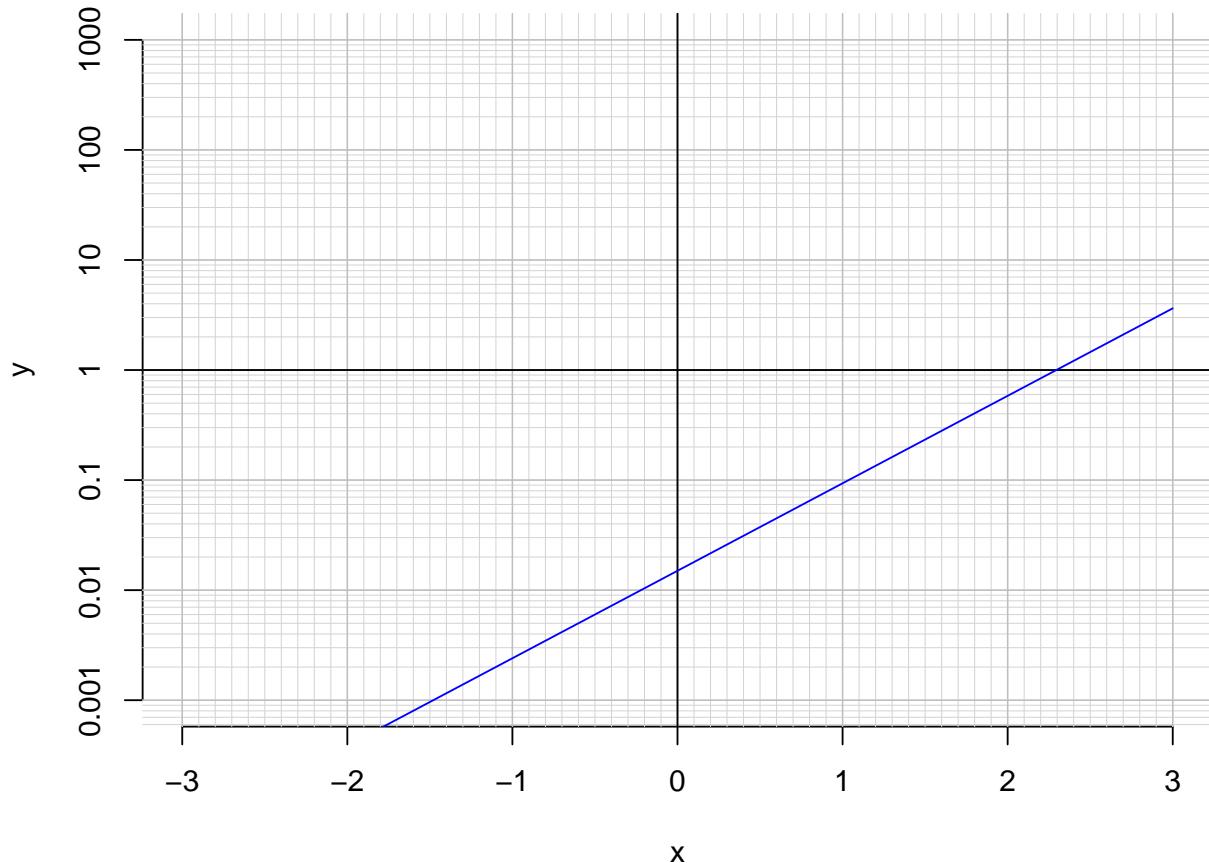
$$y = \log_2(x + 4) + 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$29 = \left(\frac{4}{3}\right) \cdot 10^{5t/7}$$

3. An exponential function $f(x) = 0.015 \cdot e^{1.83x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.7)$.

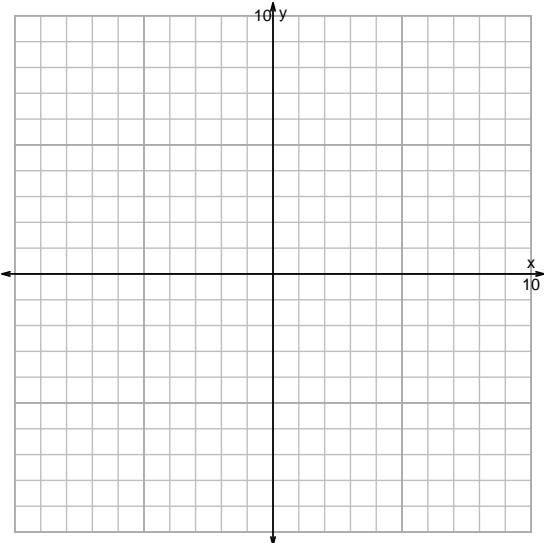
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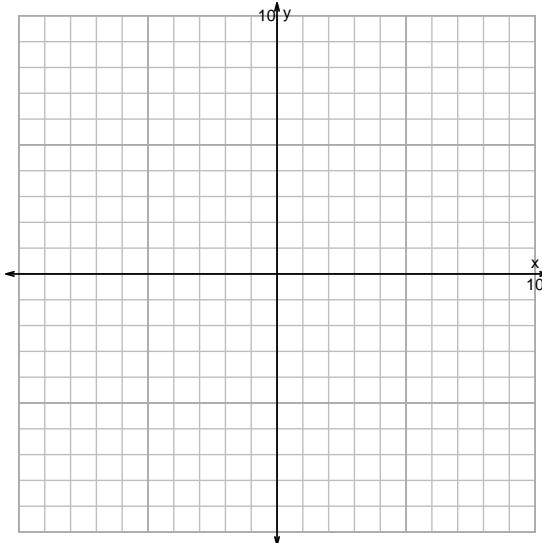
s18QUIZ: EXP LOG (PRACTICE v135)

1. Graph $y = \log_2(x + 4) + 3$ and $y = 2^{x+3} + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 4) + 3$$



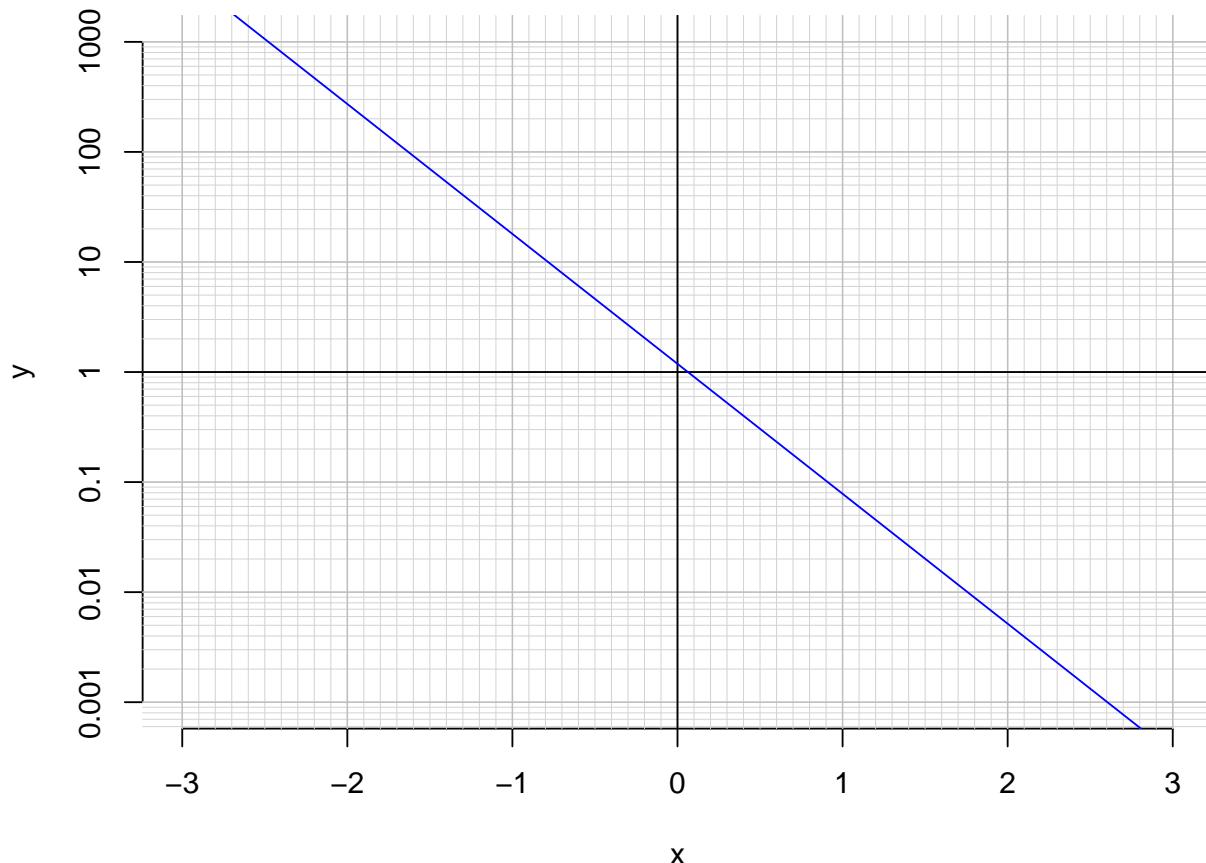
$$y = 2^{x+3} + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$19 = \left(\frac{3}{5}\right) \cdot 10^{-7t/4}$$

3. An exponential function $f(x) = 1.19 \cdot e^{-2.72x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(0.4)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(70)$.

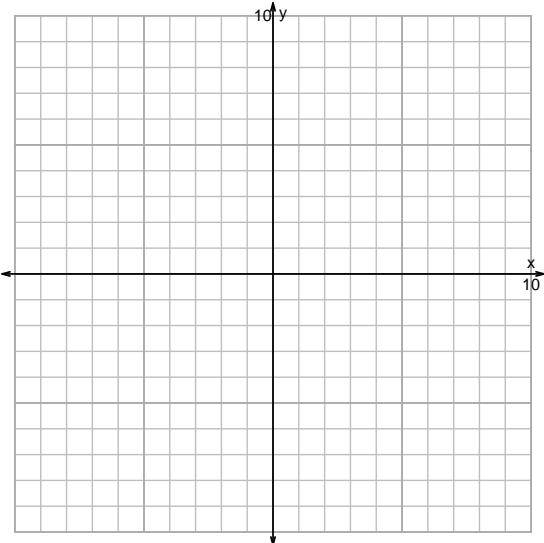
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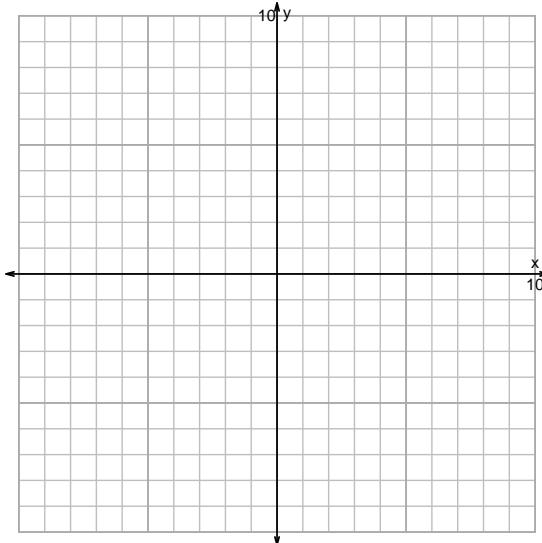
s18QUIZ: EXP LOG (PRACTICE v136)

1. Graph $y = 2^{x+6} - 3$ and $y = \log_2(x + 3) + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+6} - 3$$



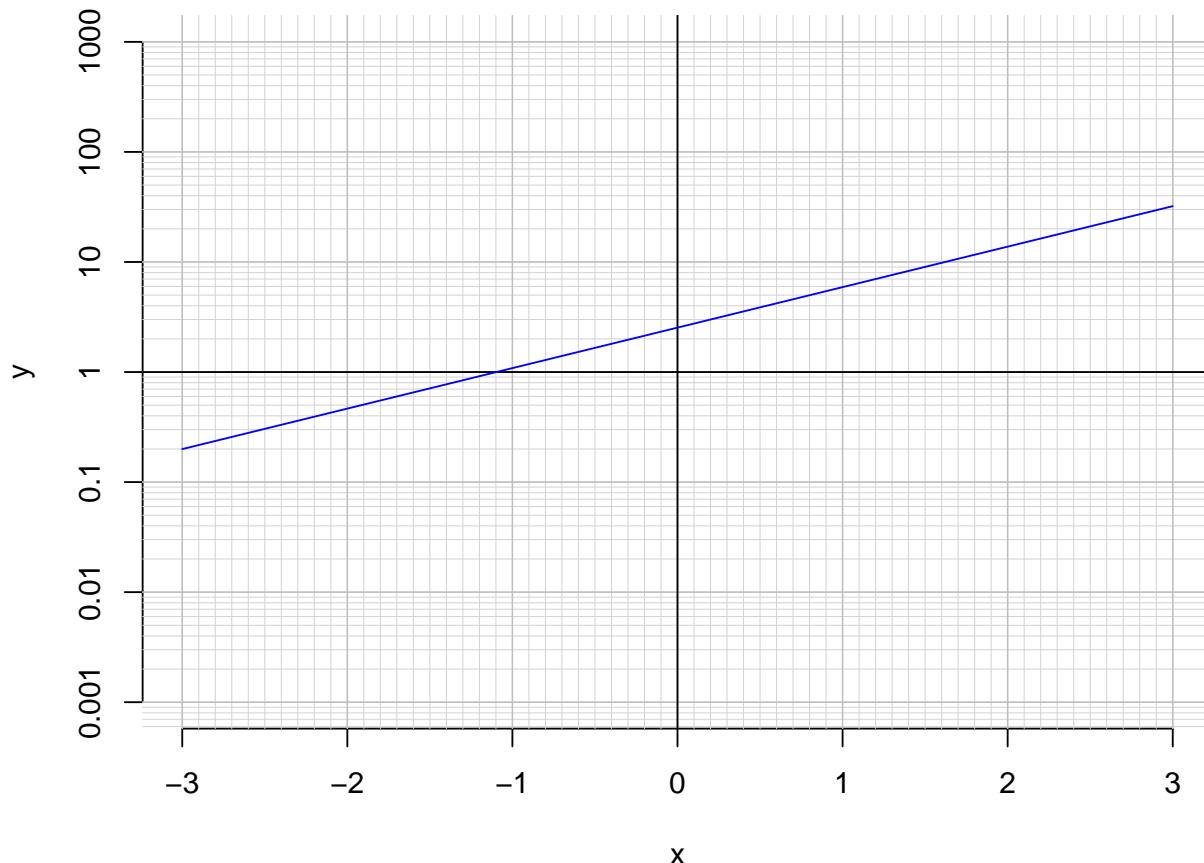
$$y = \log_2(x + 3) + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-23 = \left(\frac{-5}{7}\right) \cdot 2^{4t/3}$$

3. An exponential function $f(x) = 2.53 \cdot e^{0.847x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(0.2)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.6)$.

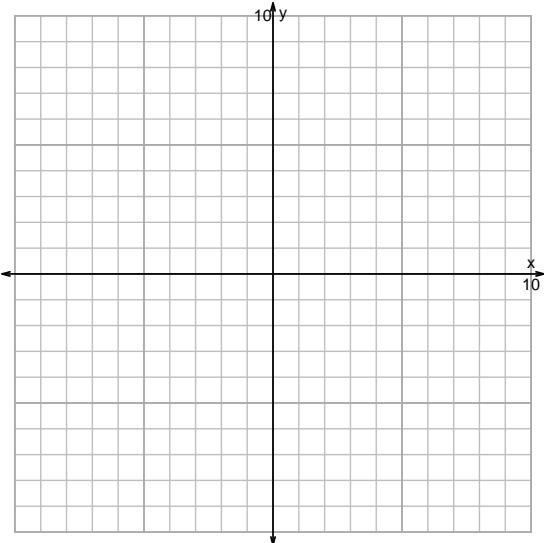
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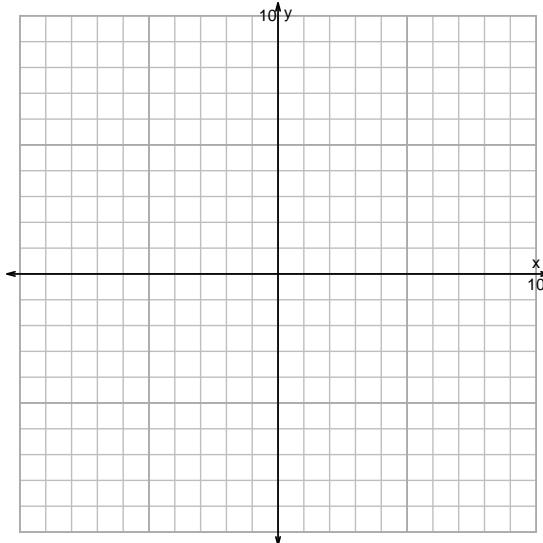
s18QUIZ: EXP LOG (PRACTICE v137)

1. Graph $y = 2^{x-5} - 4$ and $y = \log_2(x + 5) - 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-5} - 4$$



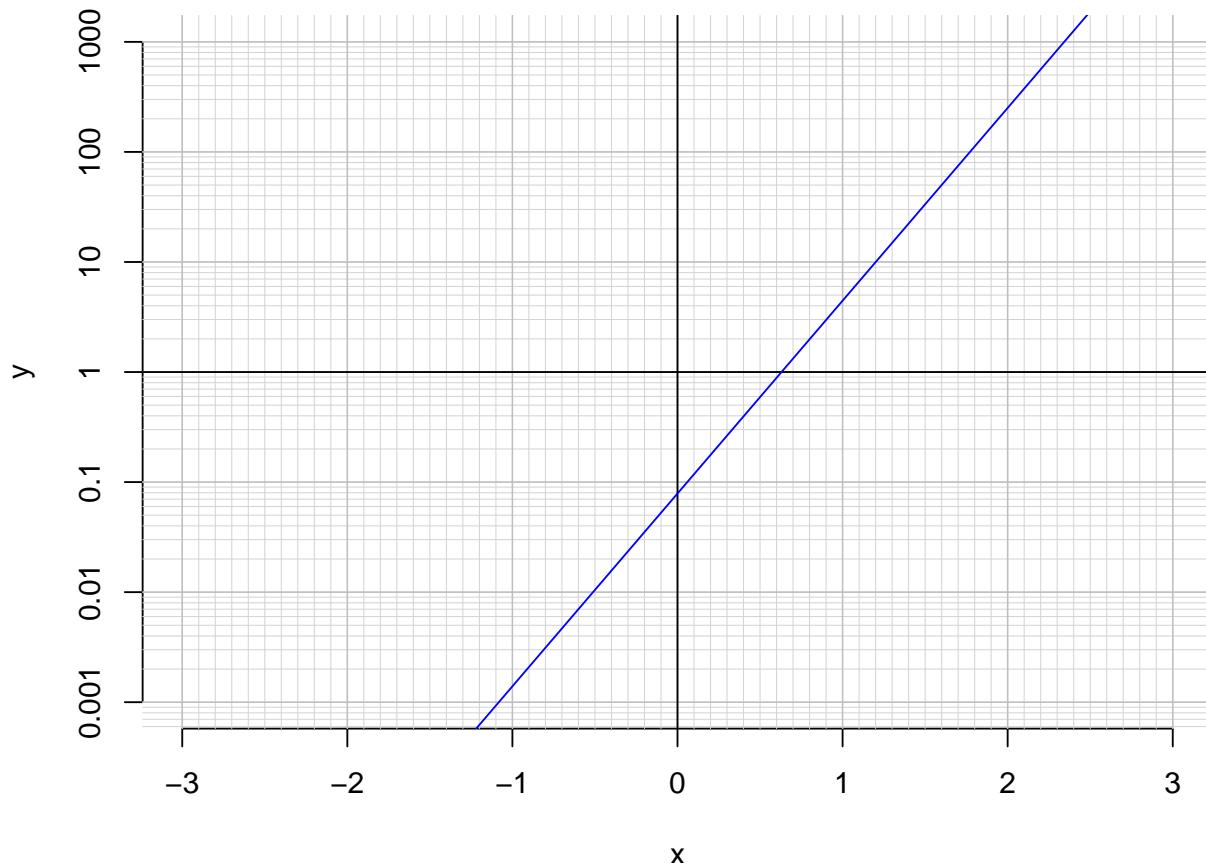
$$y = \log_2(x + 5) - 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-23 = \left(\frac{-5}{7}\right) \cdot 10^{4t/3}$$

3. An exponential function $f(x) = 0.0787 \cdot e^{4.03x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-0.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(50)$.

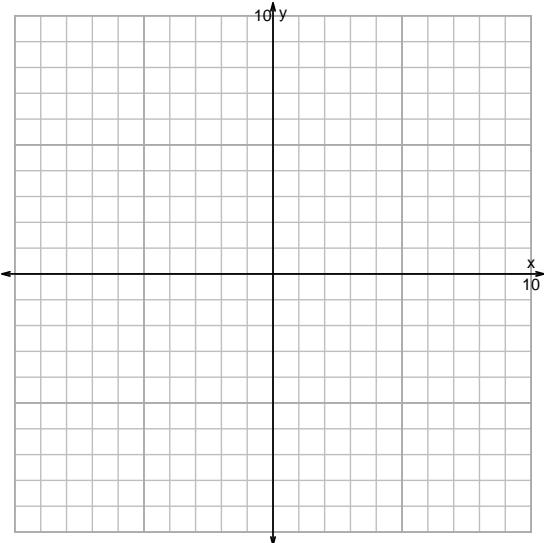
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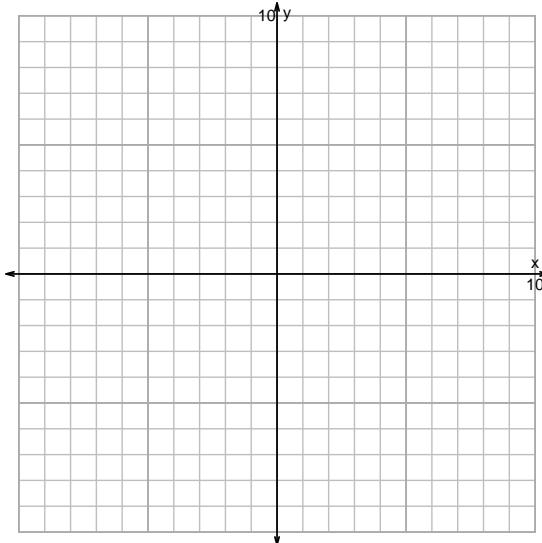
s18QUIZ: EXP LOG (PRACTICE v138)

1. Graph $y = \log_2(x - 6) - 4$ and $y = 2^{x+4} + 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 6) - 4$$



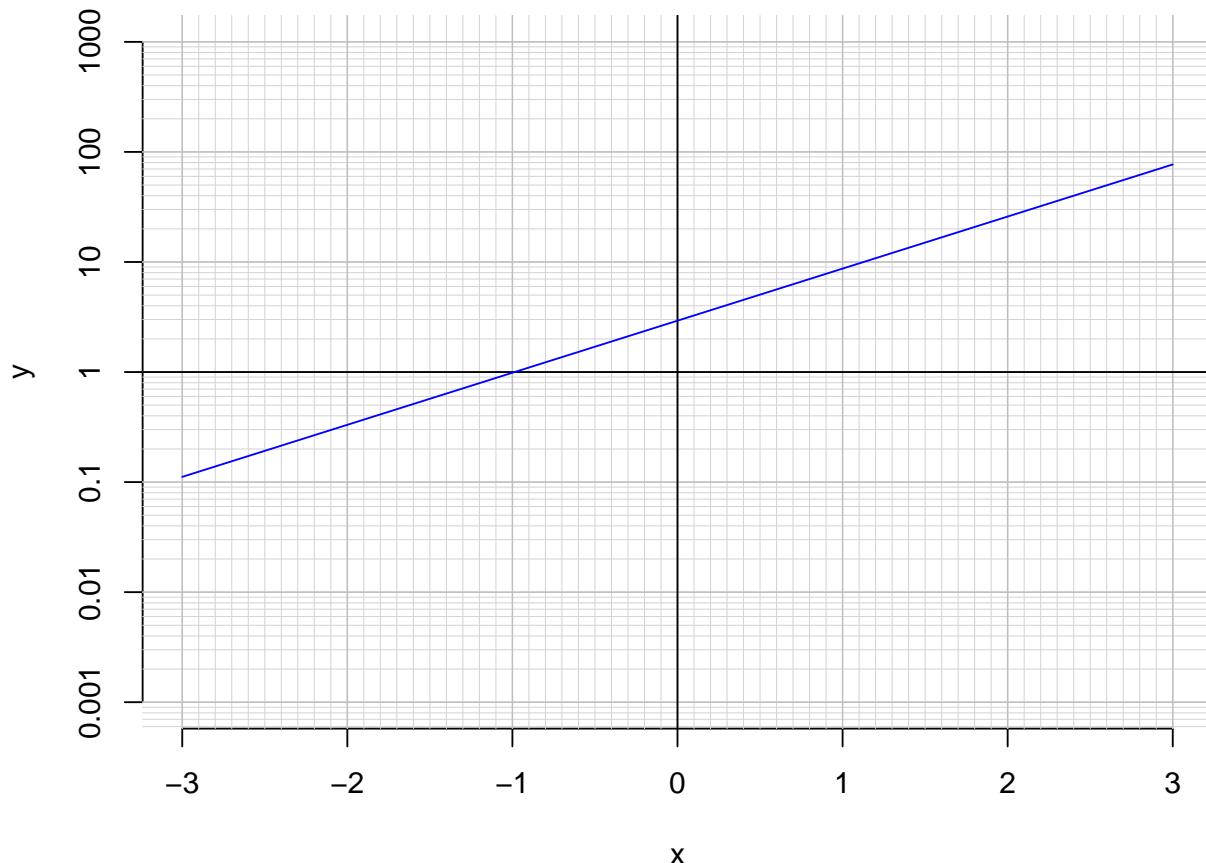
$$y = 2^{x+4} + 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-23 = \left(\frac{-3}{7}\right) \cdot 10^{5t/4}$$

3. An exponential function $f(x) = 2.93 \cdot e^{1.09x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.4)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(7)$.

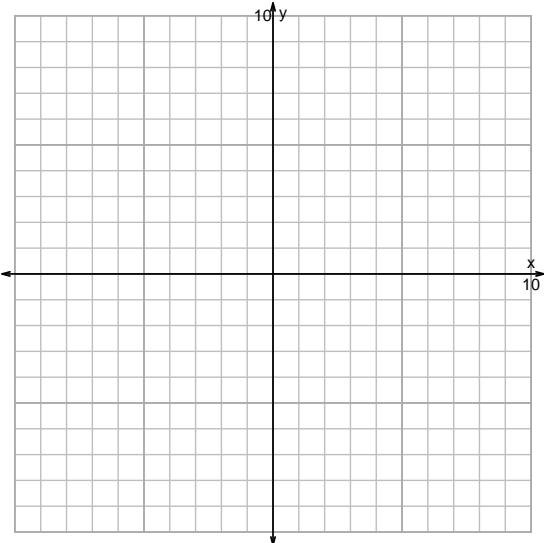
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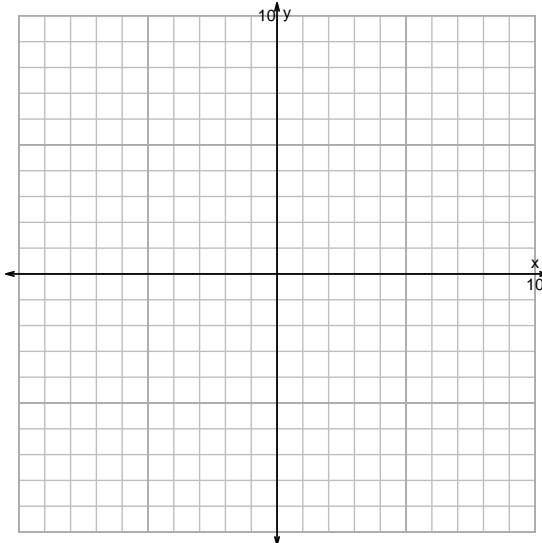
s18QUIZ: EXP LOG (PRACTICE v139)

1. Graph $y = \log_2(x - 6) + 4$ and $y = 2^{x-4} + 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 6) + 4$$



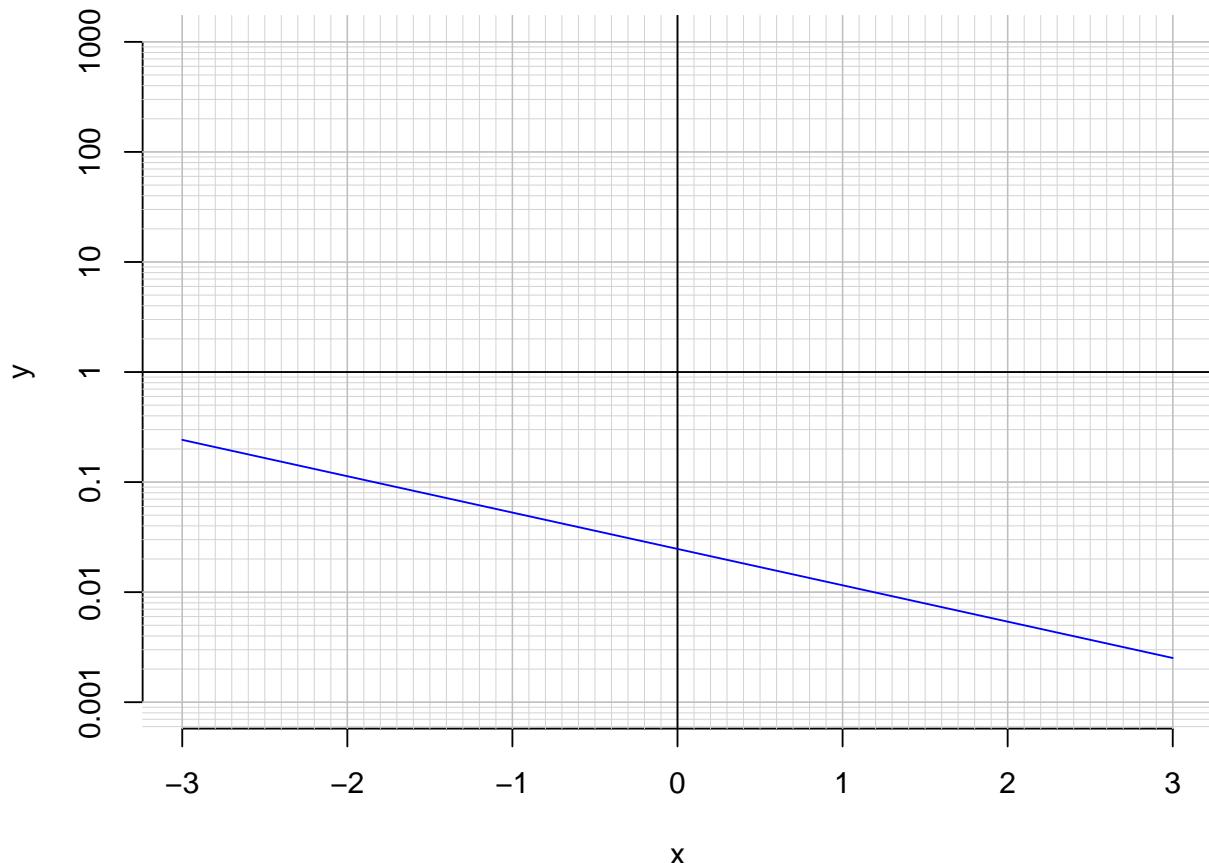
$$y = 2^{x-4} + 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-19 = \left(\frac{-5}{4}\right) \cdot 2^{3t/7}$$

3. An exponential function $f(x) = 0.0247 \cdot e^{-0.761x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.7)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.005)$.

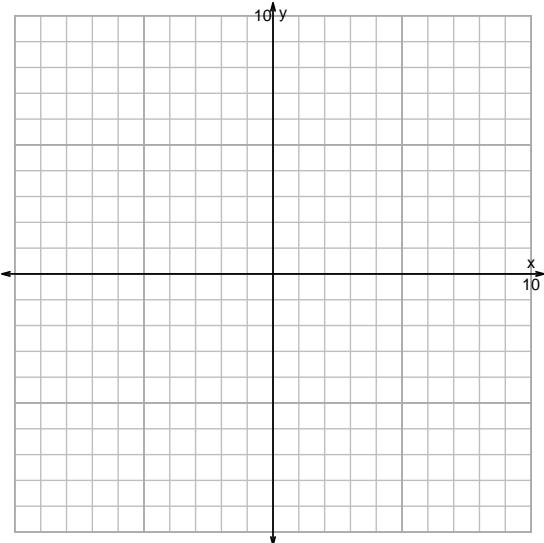
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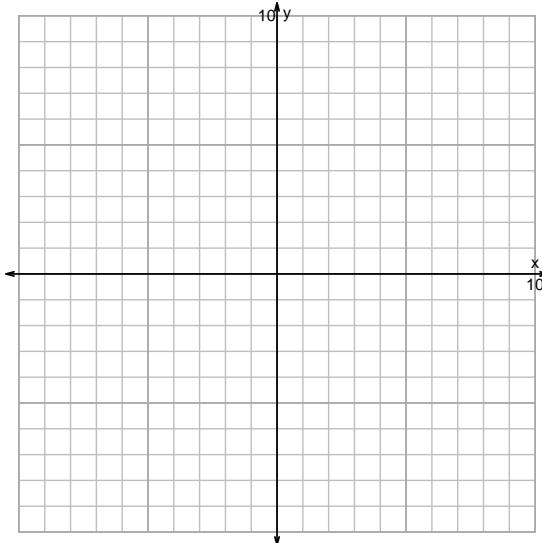
s18QUIZ: EXP LOG (PRACTICE v140)

1. Graph $y = \log_2(x - 5) + 4$ and $y = 2^{x+5} - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 5) + 4$$



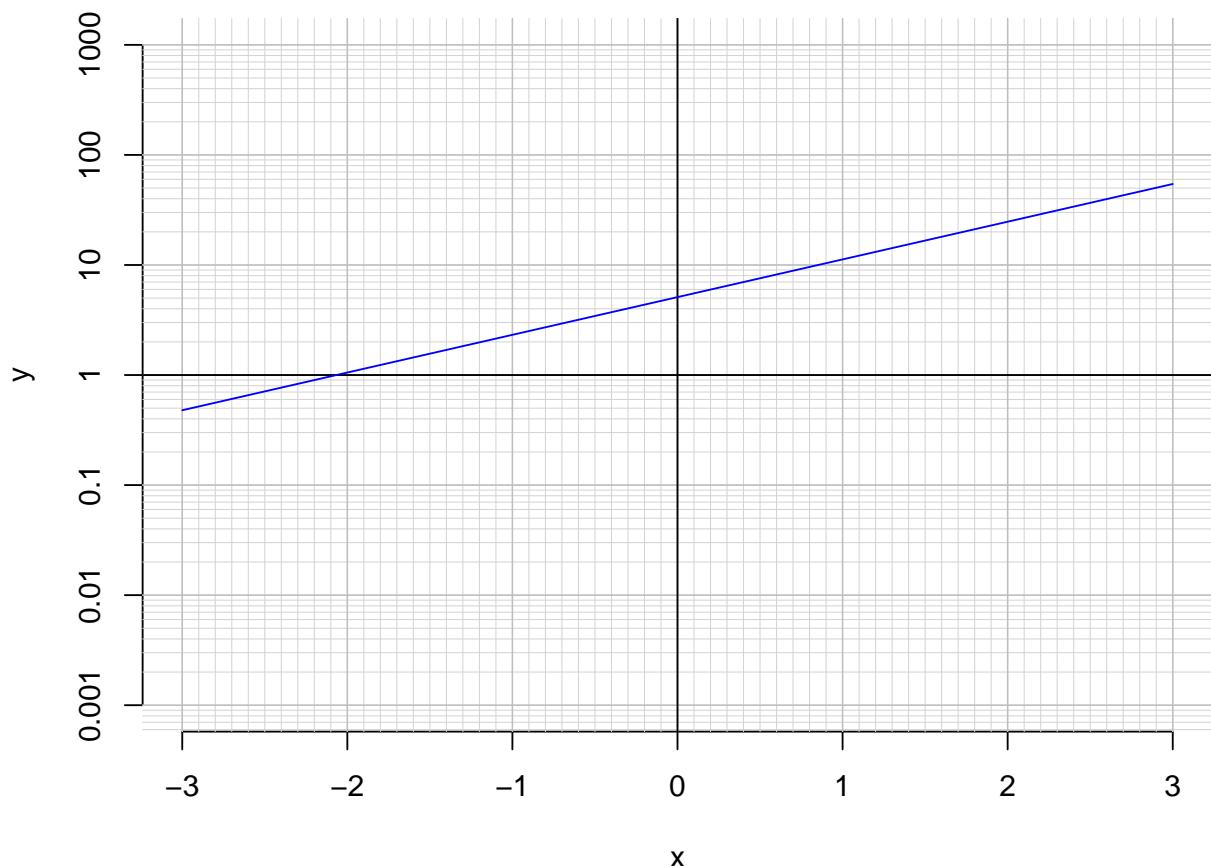
$$y = 2^{x+5} - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-17 = \left(\frac{-4}{7}\right) \cdot 2^{5t/3}$$

3. An exponential function $f(x) = 5.11 \cdot e^{0.789x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-2.2)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(7)$.

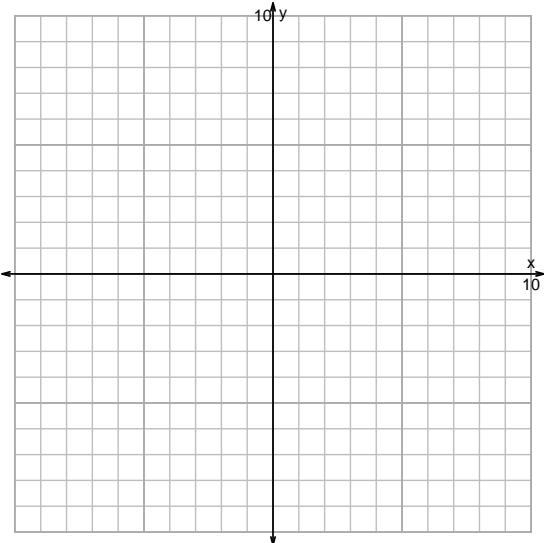
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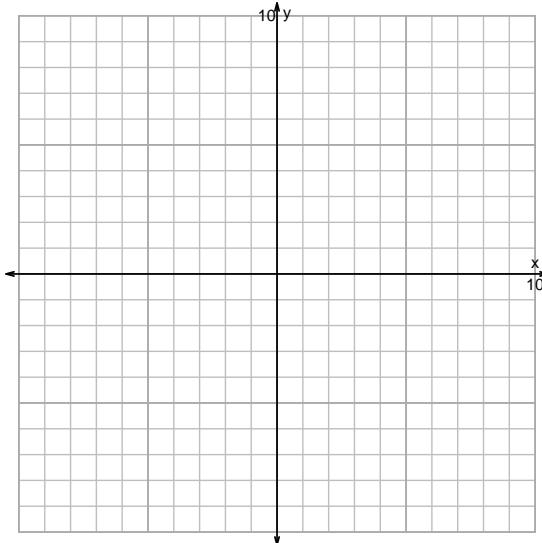
s18QUIZ: EXP LOG (PRACTICE v141)

1. Graph $y = \log_2(x - 4) - 3$ and $y = 2^{x-4} - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 4) - 3$$



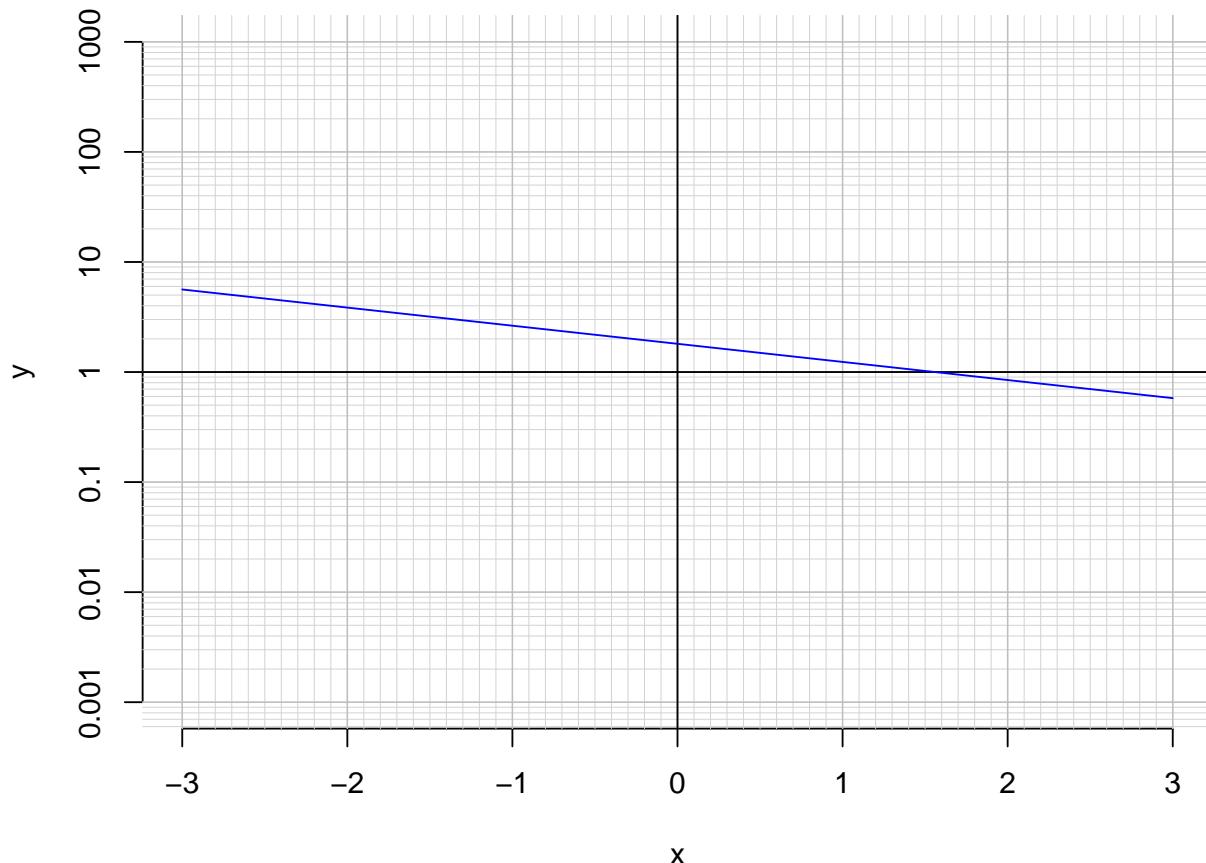
$$y = 2^{x-4} - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$17 = \left(\frac{4}{7}\right) \cdot 2^{5t/3}$$

3. An exponential function $f(x) = 1.81 \cdot e^{-0.379x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-2.1)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.7)$.

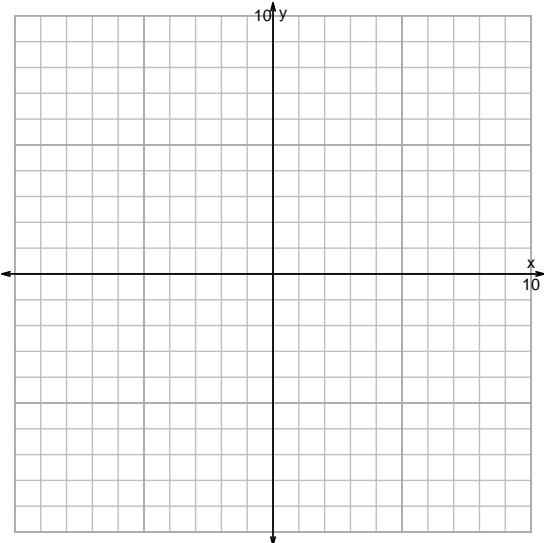
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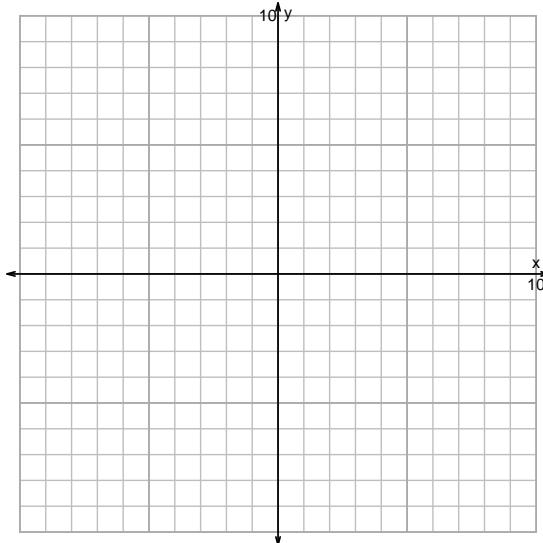
s18QUIZ: EXP LOG (PRACTICE v142)

1. Graph $y = \log_2(x - 3) + 5$ and $y = 2^{x+3} + 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 3) + 5$$



$$y = 2^{x+3} + 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$23 = \left(\frac{3}{7}\right) \cdot 2^{-4t/5}$$

3. An exponential function $f(x) = 0.0109 \cdot e^{3.07x}$ is graphed below on a semi-log plot.



- a. Using the plot above, evaluate $f(1.7)$.
- b. Express $f^{-1}(x)$, the inverse of f .
- c. Using the plot above, evaluate $f^{-1}(0.008)$.

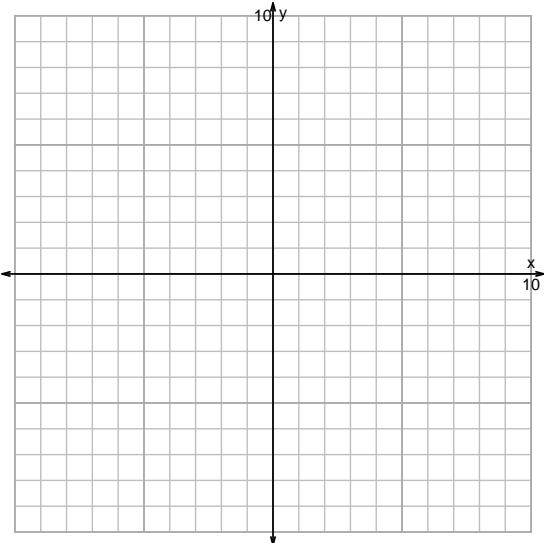
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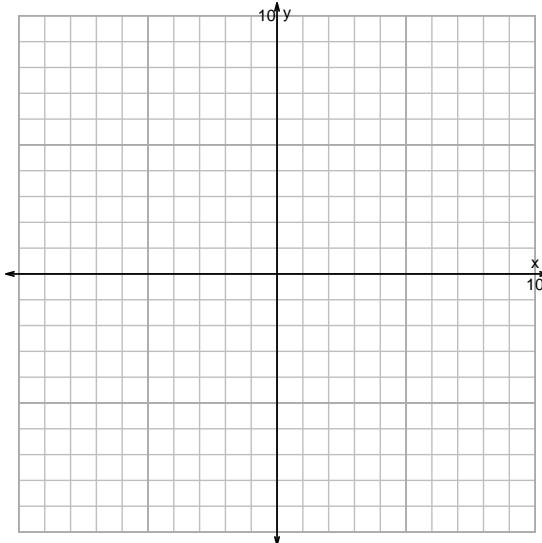
s18QUIZ: EXP LOG (PRACTICE v143)

1. Graph $y = 2^{x-6} + 4$ and $y = \log_2(x+3) + 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-6} + 4$$



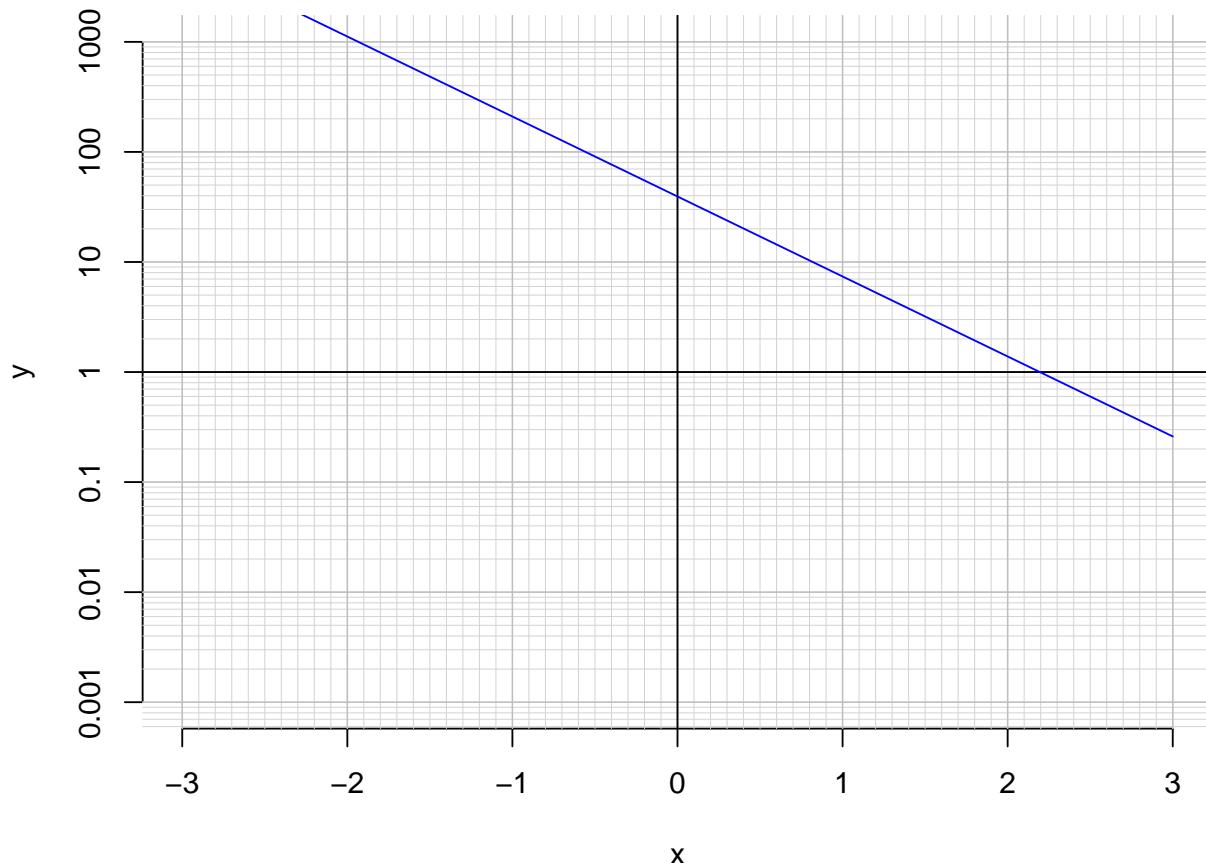
$$y = \log_2(x+3) + 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$19 = \left(\frac{5}{4}\right) \cdot 2^{7t/3}$$

3. An exponential function $f(x) = 39.4 \cdot e^{-1.67x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.5)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(800)$.

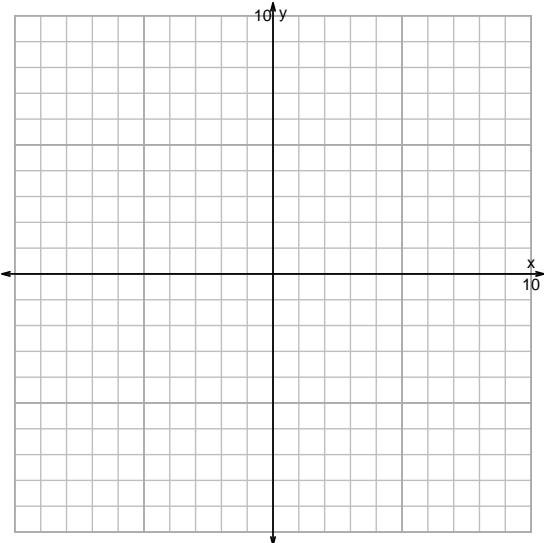
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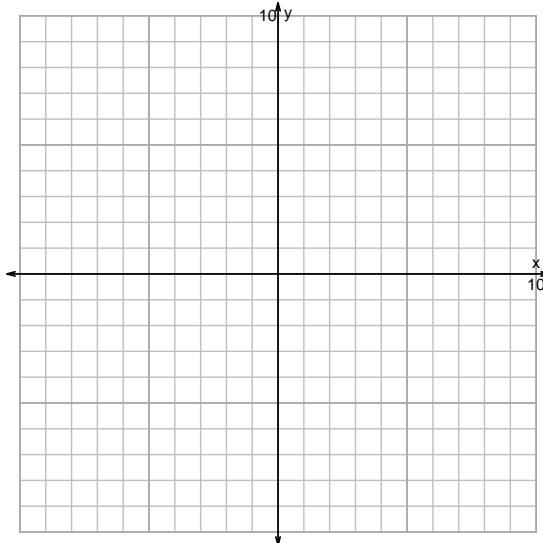
s18QUIZ: EXP LOG (PRACTICE v144)

1. Graph $y = 2^{x-5} - 6$ and $y = \log_2(x-5) - 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-5} - 6$$



$$y = \log_2(x-5) - 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-19 = \left(\frac{-4}{5}\right) \cdot 2^{-3t/7}$$

3. An exponential function $f(x) = 0.0324 \cdot e^{-1.1x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.7)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.07)$.

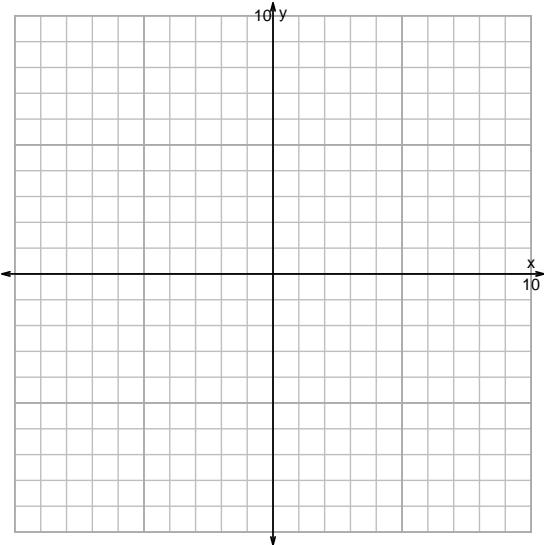
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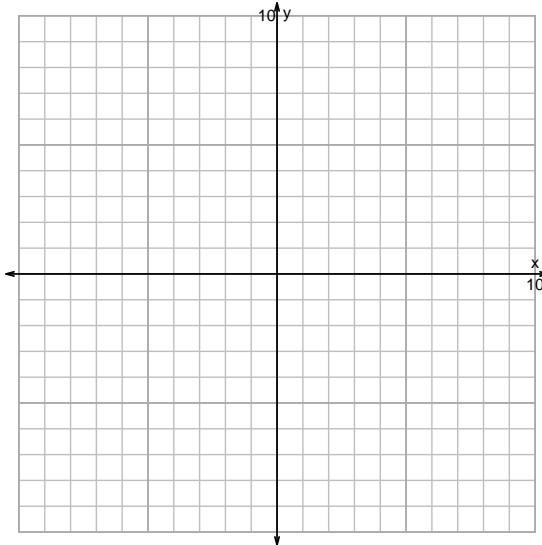
s18QUIZ: EXP LOG (PRACTICE v145)

1. Graph $y = 2^{x-4} - 6$ and $y = \log_2(x - 5) + 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-4} - 6$$



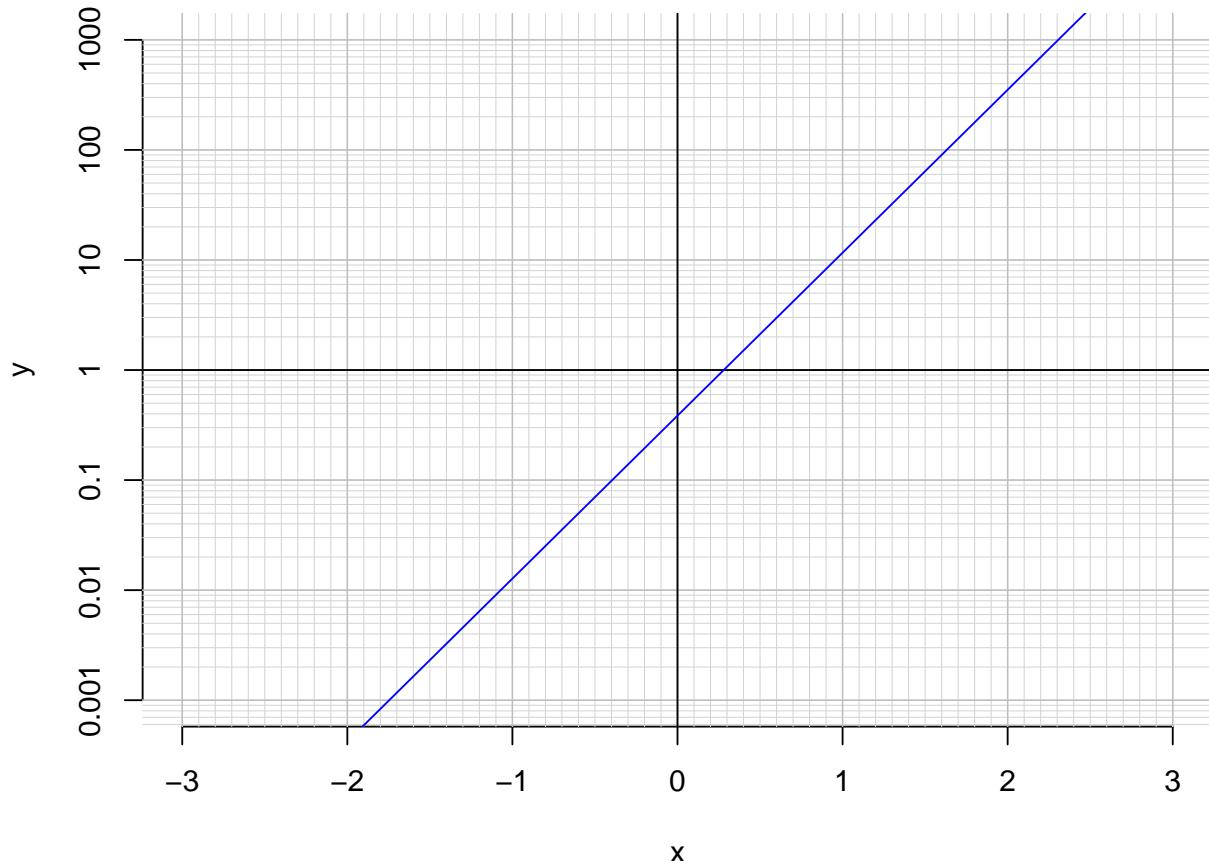
$$y = \log_2(x - 5) + 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-11 = \left(\frac{-7}{3}\right) \cdot 2^{-4t/5}$$

3. An exponential function $f(x) = 0.385 \cdot e^{3.41x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.6)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.07)$.

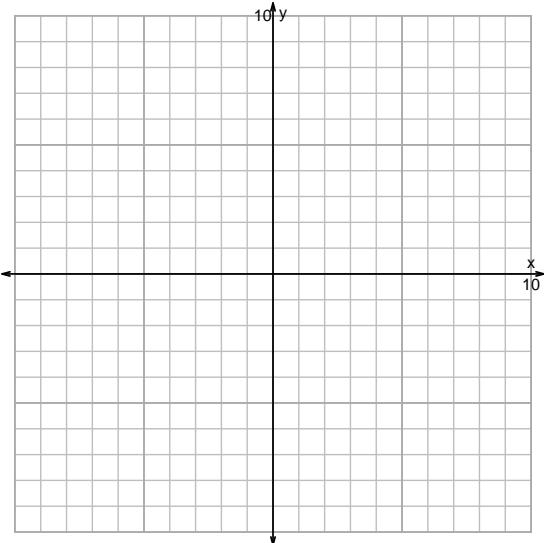
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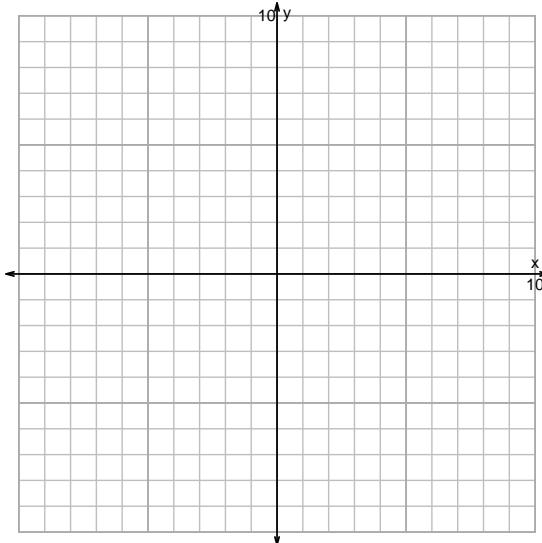
s18QUIZ: EXP LOG (PRACTICE v146)

1. Graph $y = \log_2(x - 4) - 5$ and $y = 2^{x-6} - 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 4) - 5$$



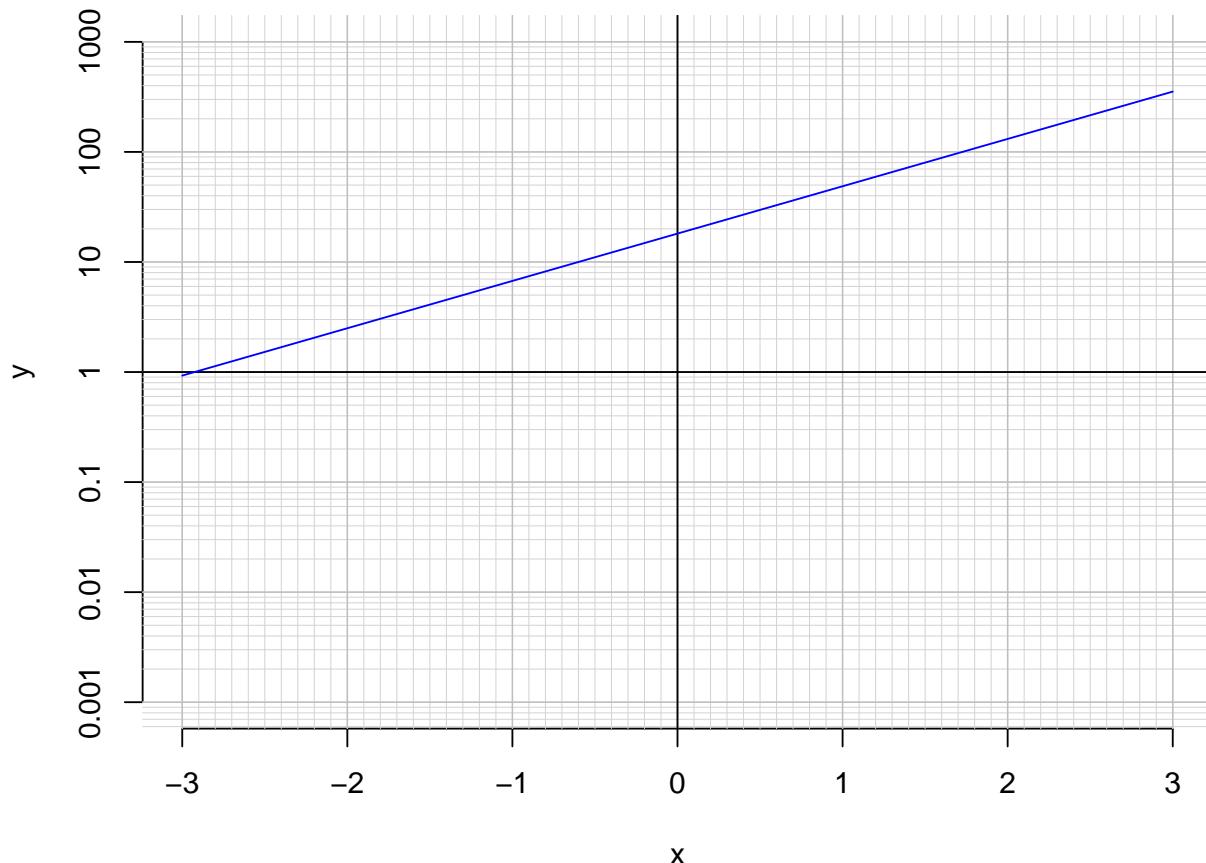
$$y = 2^{x-6} - 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-17 = \left(\frac{-3}{7}\right) \cdot 10^{4t/5}$$

3. An exponential function $f(x) = 18.1 \cdot e^{0.99x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.3)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(20)$.

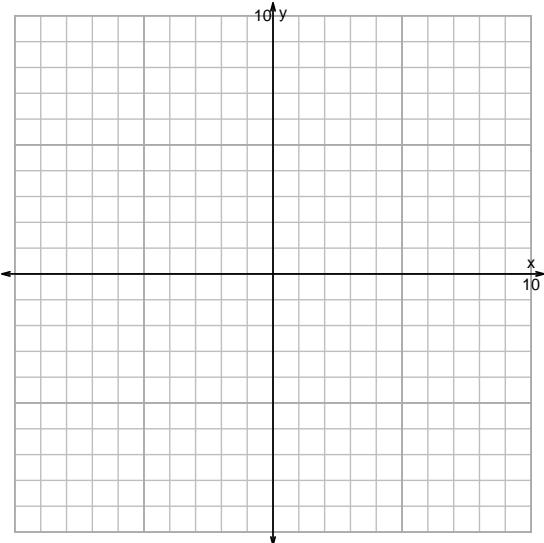
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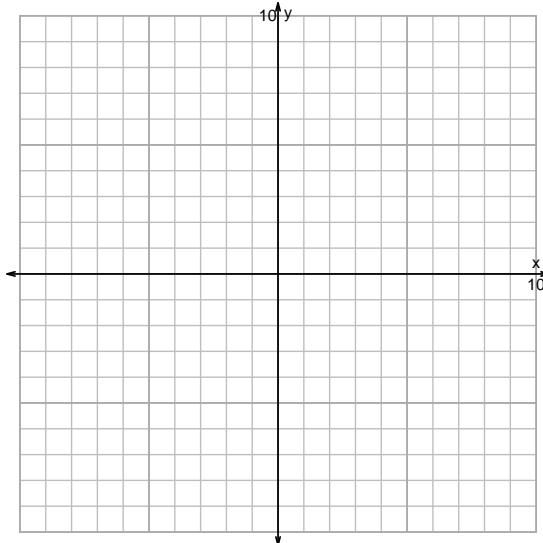
s18QUIZ: EXP LOG (PRACTICE v147)

1. Graph $y = 2^{x-3} - 5$ and $y = \log_2(x-3) - 5$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x-3} - 5$$



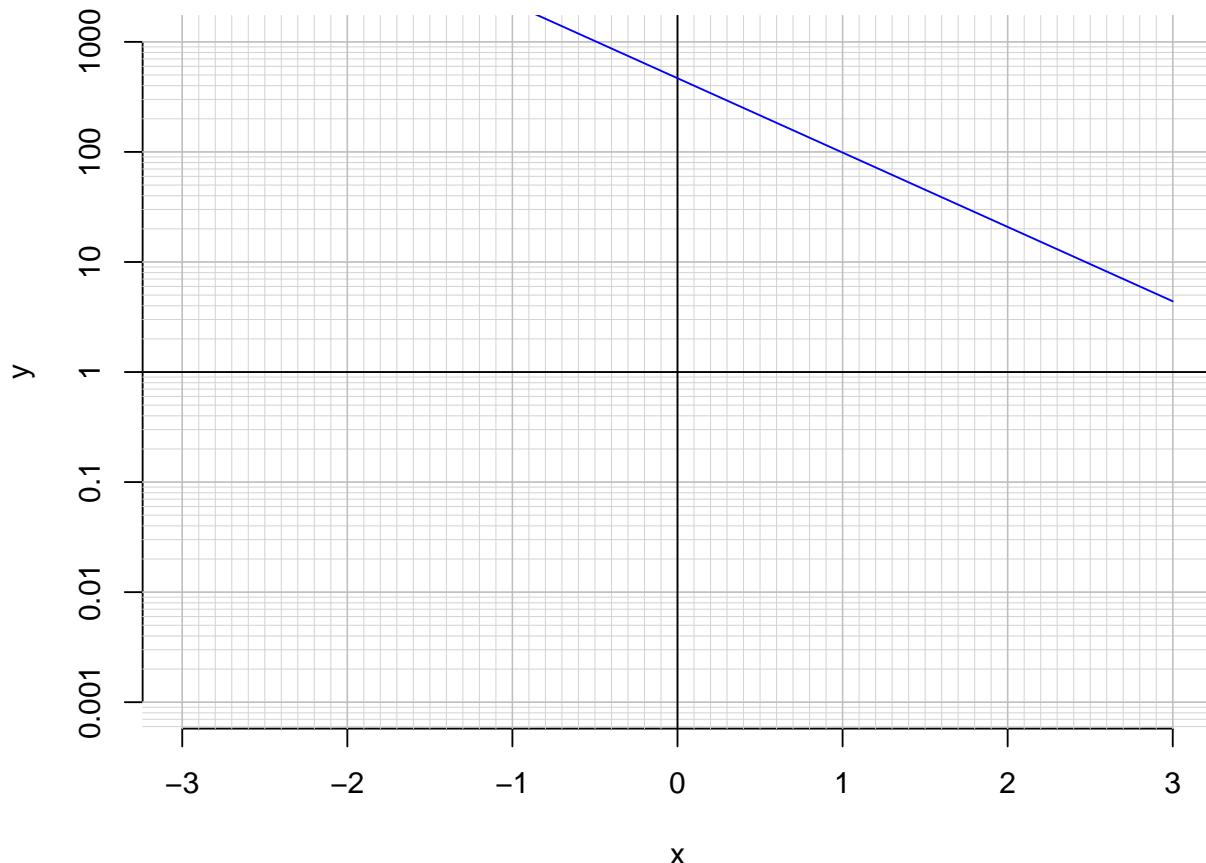
$$y = \log_2(x-3) - 5$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-23 = \left(\frac{-3}{7}\right) \cdot 10^{4t/5}$$

3. An exponential function $f(x) = 467 \cdot e^{-1.56x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(2.8)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(400)$.

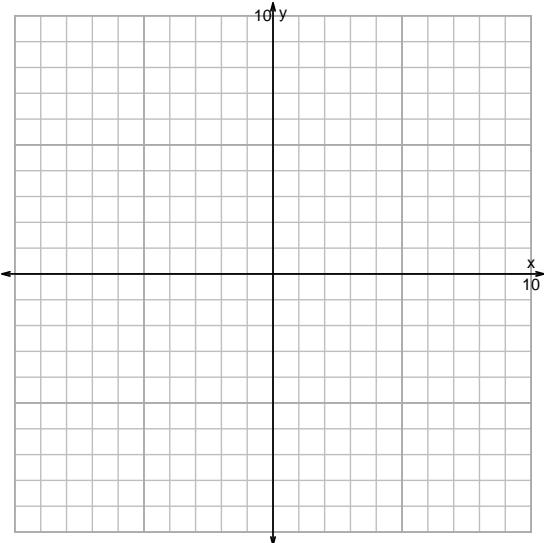
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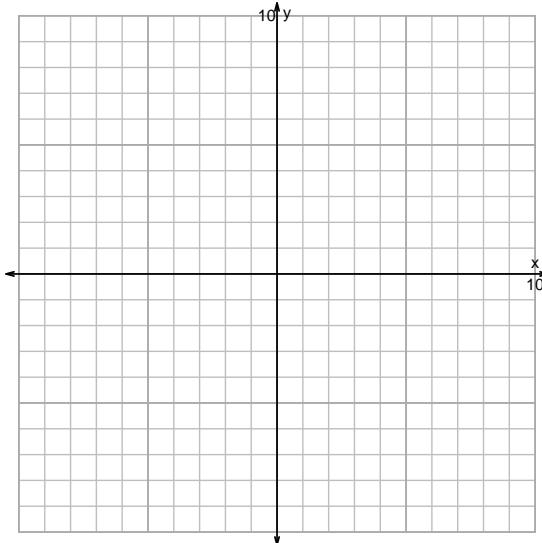
s18QUIZ: EXP LOG (PRACTICE v148)

1. Graph $y = \log_2(x - 5) - 3$ and $y = 2^{x+5} + 3$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x - 5) - 3$$



$$y = 2^{x+5} + 3$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-17 = \left(\frac{-3}{4}\right) \cdot 10^{7t/5}$$

3. An exponential function $f(x) = 0.0372 \cdot e^{-1.4x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.1)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(0.4)$.

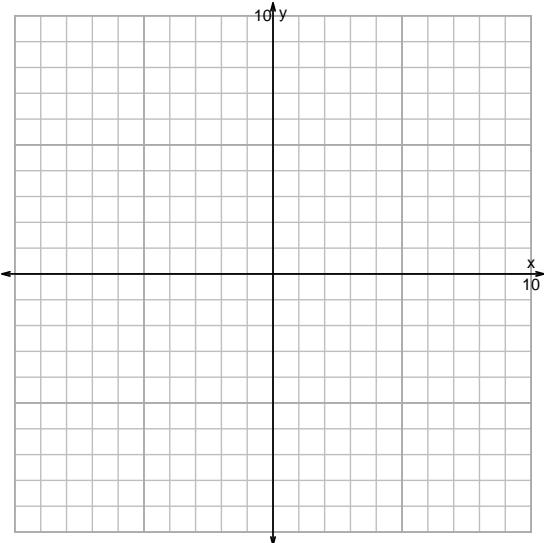
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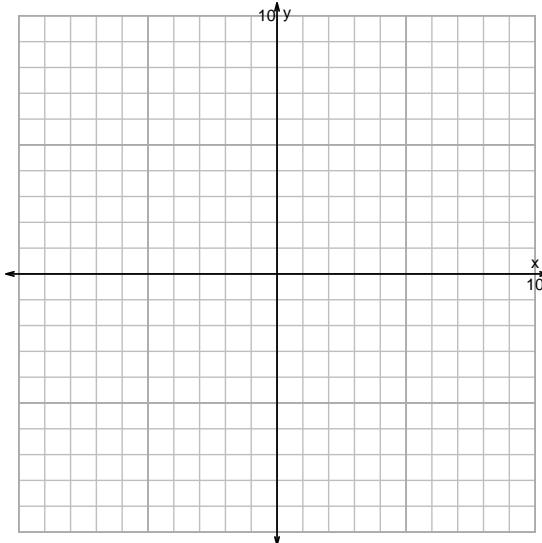
s18QUIZ: EXP LOG (PRACTICE v149)

1. Graph $y = \log_2(x + 6) + 5$ and $y = 2^{x-6} - 4$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = \log_2(x + 6) + 5$$



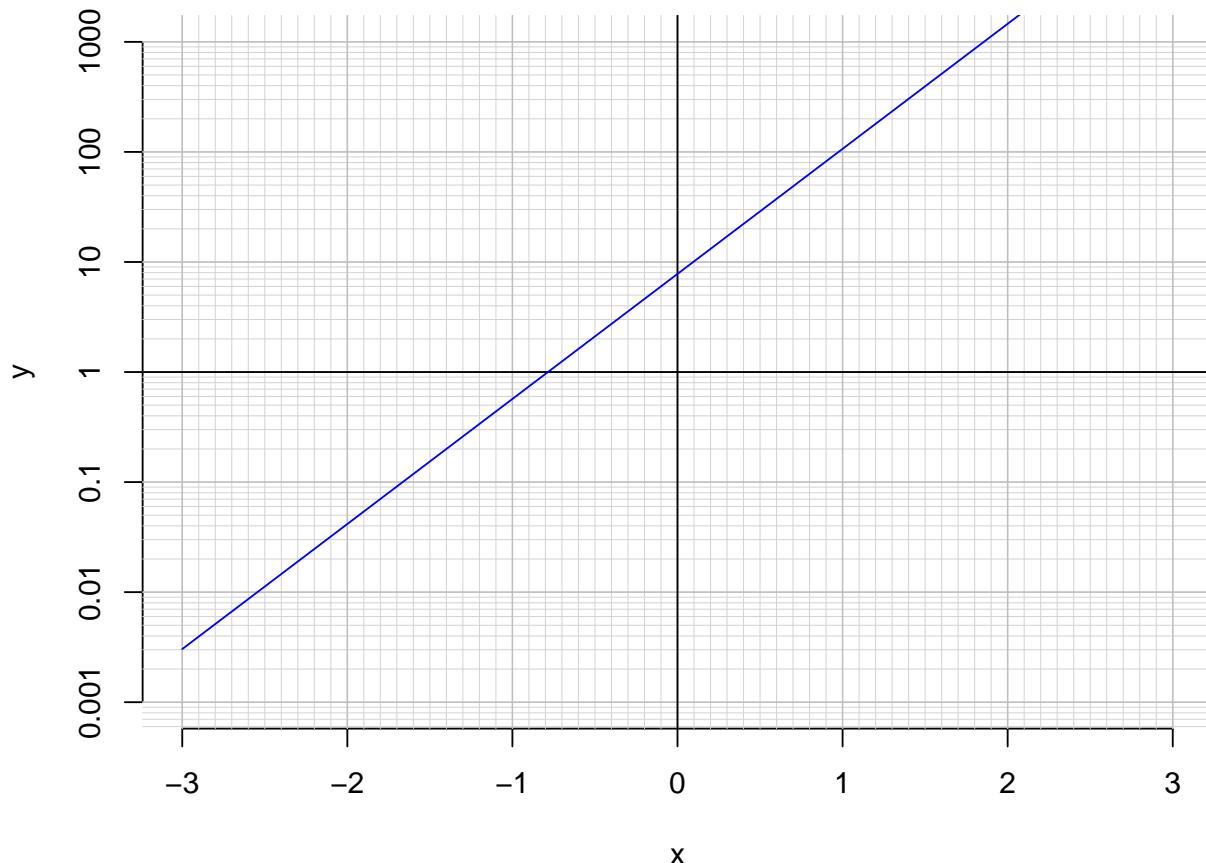
$$y = 2^{x-6} - 4$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-11 = \left(\frac{-3}{4}\right) \cdot 10^{7t/5}$$

3. An exponential function $f(x) = 7.79 \cdot e^{2.62x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(-1.4)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(6)$.

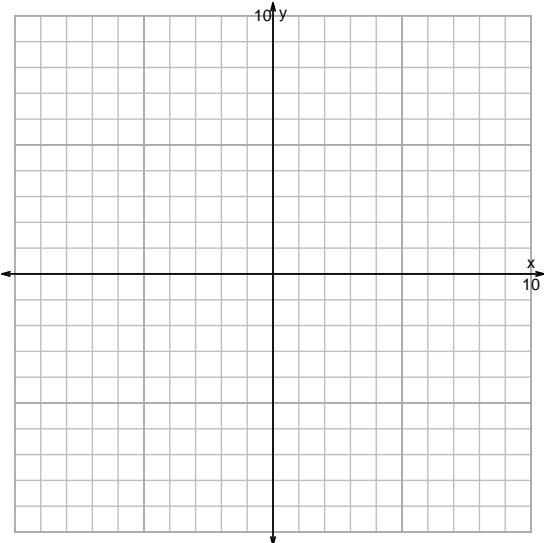
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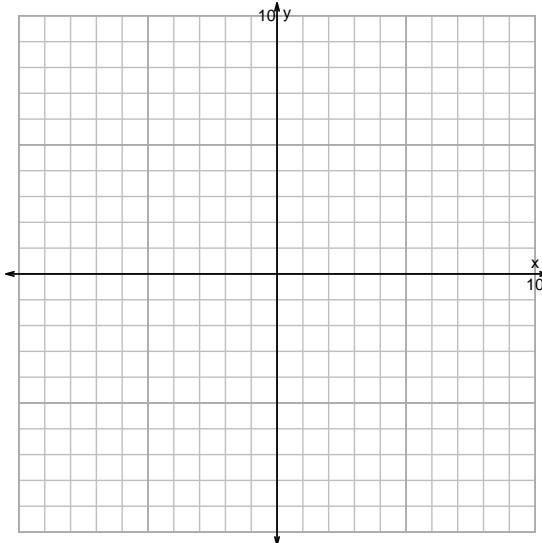
s18QUIZ: EXP LOG (PRACTICE v150)

1. Graph $y = 2^{x+5} - 4$ and $y = \log_2(x + 5) - 6$ on the grids below. Also, draw any asymptotes with dotted lines.

$$y = 2^{x+5} - 4$$



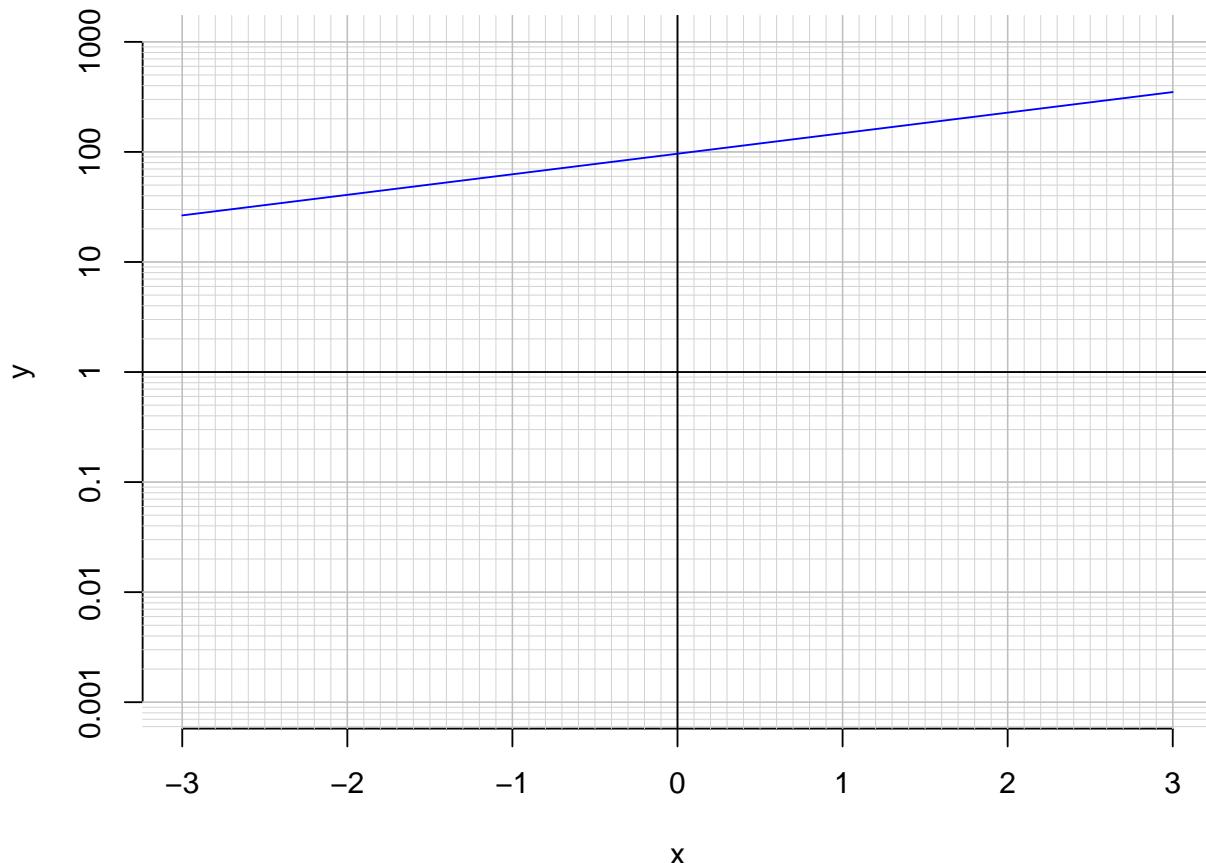
$$y = \log_2(x + 5) - 6$$



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$23 = \left(\frac{5}{3}\right) \cdot 10^{4t/7}$$

3. An exponential function $f(x) = 96.3 \cdot e^{0.43x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.7)$.

b. Express $f^{-1}(x)$, the inverse of f .

c. Using the plot above, evaluate $f^{-1}(60)$.